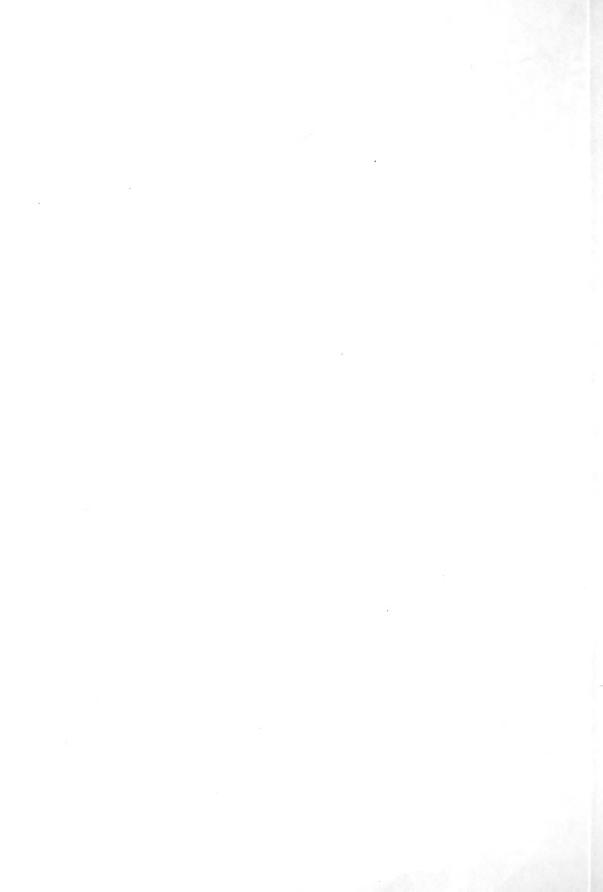
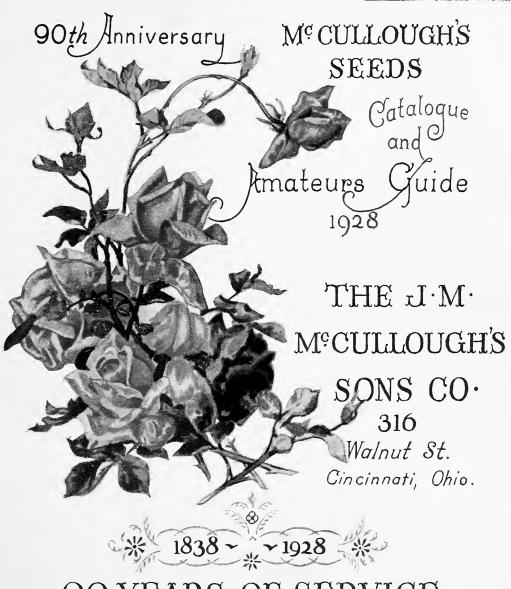
Historic, Archive Document

Do not assume content reflects current scientific knowledge, policies, or practices.





90 YEARS OF SERVICE

Phone Main 4597



Instructions To Purchasers



POSTAGE in first and second zones. For third zone add 8c per pound; for all other zones add extra postage in proportion. See Parcel Post Rates.

Packets and half pounds of Beans, Corn and Peas are sent postpaid at prices quoted, and all other varieties of Vegetable and all Flower Seeds will be forwarded free by mail at Catalog Prices unless otherwise noted. Grass Seeds. Clover Seeds, Miscellaneous Seeds, Plants, Tools and Supplies are not sent free by mail—see Parcel Post Rates.

Order Early. It will greatly facilitate shipments if orders are sent early. We aim to send off all orders the day received.

Send the Money with the Order. Postal Note, Postoffice Order, Registered Letter, Express Money Order, or Draft on Cincinnati or New York. United States Postage Stamps will be received for small amounts; be exceedingly careful about the least moisture getting on them when remitting, as they sometimes reach us so stuck together as to be almost worthless.

We do not send C. O. D. Everything being plainly priced, the return charges on money is an unnecessary expense.

Should you change your address, we will esteem it a favor if you will notify us, so we can forward our Catalog with regularity; if you receive two Catalogs of the same kind please hand one to some friend who has a garden.

Should an error occur, we desire to be promptly informed, and will take pleasure in making satisfactory corrections.

Write your Name and Address distinctly and in full; please use the Order Sheet and Envelope inserted in this Catalog.

PARCEL POST RATES

All parcels of seeds, bulbs and plants, up to and including 8 oz. at the rate of 1c for each 2 oz. regardless of distance; over 8 oz., at the Zone Rate. All merchandise other than seeds, bulbs and plants up to and including 4 oz. in weight can be sent at the rate of 1c an ounce regardless of distance. Over 4 oz. at the Zone Rate.

NOTE:—When estimating postage on goods not included in our free delivery, bear in mind that while the packing on one pound may only weigh the fraction of a pound, it must be considered as a full pound when adding postage. On larger quantities add postage in proportion.

Limit of weight for denvery within local, first, second and third zones is 70 pounds; to all other zones, 50 pounds.

When larger quantities are wanted we can pack in two or more parcels if necessary, provided money is remitted to cover postage.

Zone First	
1 and 2—150 miles	1c
3—150 to 300 miles 8c	2 c
4—300 to 600 miles 9c	4 c
5—600 to 1,000 miles10c	6 c
6—1,000 to 1,400 miles11c	8 c
7—1.400 to 1,800 miles13c	10c
8—All over 1,800 miles14c	12 c

It is advisable to have all merchandise insured. Present rates of Parcel Post insurance are as follows:

Not exceeding	\$ 25.00	value	 	 8c
Not exceeding	50.00	value	 	 10c
Not exceeding	100.00	value	 	 $\dots \dots 25c$

If insurance is desired, add to remittance as indicated above.

Poisons cannot be sent by mail. Liquids and goods packed in glass should be sent by Express.

About Warranting Seeds—We have often been asked if we "guarantee or warrant our Seeds." We beg to state plainly we do not, for the reason that practical experience has assured us of the fact that crops may fail, no matter how fresh or pure the seed sown may be. We trust that our customers will fully realize that it is to our interest to send none but the very best quality of seeds. It would be folly to do otherwise, unless we wanted to sacrifice our good reputation for selling Reliable Seeds, which we are constantly striving to extend.

To secure success, however, it is necessary that the customer should do his part well, or our good seeds will be ruined. With the best of management and with good seeds there will be an occasional unaccountable failure. The best of gardeners sometimes fail, and try again with the same seed with good results.

The J. M. McCullough's Sons Co., gives no warranty, express or implied, as to description, quality, productiveness or any other matter of any seeds, bulbs or plants it sells, and it will not be in any way responsible for the crop.

We shall always be pleased to reward customers who send us the names and post-office addresses of their friends who buy Seeds, Bulbs, Plants, Poultry Supplies, etc.

Trade Marks Registered, McCullough's Seeds, XXXX, Buckeye, Suburban Lawn Grass, Central Park Lawn Grass

McCullough's "SUBURBAN" LAWN GRASS SEED

ASSURES A SUCCESSFUL LAWN



WILL MAKE A BETTER LAWN THAN TURF OR SOD

McCullough's "Suburban" I large proportion of Kentucky Blue Grass, one of the best Lawn Grasses for the central states, but which, on account of slow growth, must be mixed with other quick-growing sorts for best results. Our mixture is the result of several years making a new lawn is 75 to 100 pounds per acre, or for renovating old lawns, 40 to 50 pounds per acre. For a plot 10 x25 or 250 square feet, one pound is required for a new lawn, or about one-half pound for renovating.

Our "Suburban" Lawn Seed mixture is very much to be preferred to any single grass, because the several varieties of grasses which compose it, mature at different seasons of the year, thus keeping the green sward in good color and condition during the hot weather, not losing its color, as the single variety is liable to do.

How to Make a Lawn.—A well-kept lawn instantly commands the attention of all lovers of the beautiful in Nature. and is an unfailing mark of intelligence and taste. To obtain best results the main point is to start right. Seed will make a better lawn than turf or sod. The best soil is a good medium texture: the surface should be thoroughly pulverized and smoothed to the desired grade; remove all large stones, roots and hardened pieces of earth that can not be readily broken, ample time being allowed for the thorough settling of the soil, which is greatly aided by a few heavy showers of rain. When the soil is firm, level and suitably moist, sow "Suburban" Law Grass Seed at the rate of 75 to 100 pounds per acre. It is unwise to be too economical in the quantity of seed used, if the best results are desired. The seed should be sown broadcast and as evenly as possible, then give a thorough rolling or tamp well with the back of a spade. The seed must be well firmed in the soil. When the young grass attains sufficient height, it should be mown with a lawn mower every week or ten days according to the seeson week or ten days, according to the season.

We have frequently been asked the question, "What causes the growth of Crab Grass in our lawns?"

From our own experience and observation, we have learned that most of our native grasses go through a rest period in late summer, generally in July and August, and it is at this time that the Crab Grass begins to make its appearance, and if the weather should prove showery it has the effect of producing a vigorous growth of this pest.

Crab Grass re-seeds itself, and experience has proven that the seeds will remain dormant in the ground an indefinite length of time until the proper season arrives for their growth and development.

No method of control is known except hand weeding, although White Clover tends to retard its growth with a sharp-toothed rake and mowing with a low-set mower is sometimes effectual in preventing seeding. Crab (not grow in the shade and is killed by the first hard frost, but the seed in the ground will grow the next season.

As Crab Grass flourishes under showery conditions, too much sprinkling may aid its growth. Do not sprinkle super-ficially or too often, a thorough soaking every ten days being much more effective.

Our "Suburban" Lawn Grass Mixture does not contain the seed of Crab Grass. "Suburban" Lawn Grass assures a successful, and with a certain amount of renovating, a permanent lawn.

General Surface Renovating.—When your lawn has been established, you will find it to your advantage to lightly re-seed each season. As early as possible, carefully rake off all dead leaves, etc., and give the lawn a dressing of LAWN AND GARDEN GROWER, or PURE BONE MEAL at the rate of at least 500 pounds per acre, and rake in, after which sow our "Suburban" Lawn Grass Seed at the rate of 40 to 50 lbs. to the acre; roll thoroughly or tamp with the back of a spade.

Renovating in Spots or Patches.—Everyone is aware that even in the best-kept lawns unsightly spots devoid of grass will appear, which are caused by root-destroying insects or fungus disease; and as these spots are not protected by a covering of turf during the winter, as a natural consequence, the chemical elements in the soil are leached out by the action of the weather, causing them to "cake" or become hard early in the spring. It is useless and a waste of seed to sow these spots unless they are carefully prepared to receive the seed. For this purpose it is our practice to cover them with either of the fertilizers mentioned above at the rate of 13 lbs, for each 250 square feet, then dig these spots up, and after raking until no trace of the fertilizers can be seen, sow our "Suburban" Lawn Grass Seed at the rate of 1 lb. to each 250 square feet. Roll thoroughly or tamp with the back of a spade. When any weeding is done on the lawn immediately drop a few graips of seed wherever a weed is removed, and while the soil is disturbed press the seed into the soil.

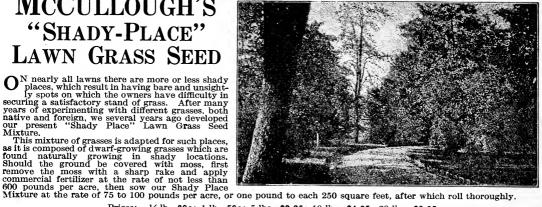
Prices: - 1/2 lb., 25c; 1 lb., 45c; 5 lbs., \$2.00; 10 lbs., \$3.75; 20 lbs., \$7.25.

Postage Must be Added if Wanted by Mail. See Postal Rates, Second Page of Cover.

LAWN AND GARDEN GROWER and PURE BONE MEAL are the Best Fertilizers for Lawns. See Fertilizers.

McCullough's "SHADY-PLACE" LAWN GRASS SEED

On nearly all lawns there are more or less shady places, which result in having bare and unsightly spots on which the owners have difficulty in securing a satisfactory stand of grass. After many years of experimenting with different grasses, both native and foreign, we several years ago developed our present "Shady Place" Lawn Grass Seed



Prices: - 1/2 lb., 30c; 1 lb., 50c; 5 lbs., \$2.25; 10 lbs., \$4.25; 20 lbs., \$8.25.

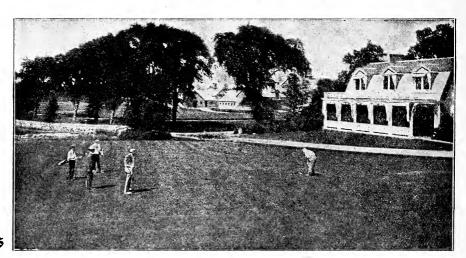
Postage Must Be Added if Wanted by Mail. See Postal Rates, Second Page of Cover.

McCullough's Eden Park Lawn Grass Seed

O supply the demand for a Lawn Grass Seed that will meet general requirements, it has become necessary to place on the market our "Eden Park." The quality of this lawn grass seed will compare favorably with a majority of the lawn grass mixtures on the market.

Prices: - 1/2 lb., 25c; 1 lb., 40c; 5 lbs., \$1.75; 10 lbs., \$3.25; 20 lbs., \$6.25.

Special Grass Seed for Putting Greens and Fairways



PUTTING GREEN MIXTURE

OF late years there has developed a tendency among golf Architects and Greenskeepers to discontinue the use of commercial grass seed mixtures on Putting Greens, due probably to many unsuitable mixtures on the market and to the increasing use of German Bent seed alone and the recently introduced method of planting Creeping Bent vegetatively by means of stolons or runners.

See page 70 for description of American Creeping Bent.

There is however a steady demand for a reliable mixture of grass seeds from those who have found Bent Greens more liable to fungus attack than Greens composed of mixed grasses, and it is to meet this demand that our mixture is prepared.

Our Putting Green Mixture contains a liberal quantity of German Bent in combination with the finest grades of Kentucky Blue Grass and Fancy Red Top, and will give fine satisfaction on green or lawn. Red Fescue may be included if desired. Sow 8 to 10 lbs. to 1,000 sq. ft. ½ lb.,40c; 1 lb.,75c; 5 lbs.,\$3.50; 10 lbs.,\$6.25; 20 lbs.,\$12.00.

We are in a position to furnish a hardy strain of Creeping Bent stolons for planting greens and lawns vegetatively. Prices and full information on application.

FAIRWAY MIXTURE

A MIXTURE of grasses for fairways is to be preferred to any one grass and our fairway mixture will give splendid satisfaction wherever used. We make no mystery of its composition and will be glad to furnish any of the grasses separately or prescribe for any condition of soil and climate. For fall sowing we recommend a large proportion of Kentucky Blue Grass, but where quick results are desired more of the rapid growing sorts must be used. Sow 100 lbs. to 150 lbs. to the acre.

1 lb.,45c; 5 lbs.,\$2.00; 50 lbs.,\$18.00; 100 lbs.,\$35.00.

TERRACE MIXTURE

THERE is nothing more annoying than to have ground washed out. In this mixture we have put quick-growing and deep-rooted grasses. Of course, it depends a great deal on this being well started before very heavy rains, ½ lb.,25c; 1 lb.,45c; 5 lbs.,\$2.00; 10 lbs.,\$3.75; 20 lbs.,\$7.25.

Sulphate of Ammonia Phosphate of Ammonia and Nitrate of Soda applied sparingly are the best fertilizers for Putting Greens.

We wish to emphasize the fact that one of the important essentials for success in building lawns, lies in the abundant use of Fertilizers, which should be applied at the rate of not less than 600 pounds per acre.

Armour's Lawn and Garden Grower and Bone Meal are the Best Fertilizers for Lawns. See Fertilizers.

Most Popular Tested and Approved Varieties. ROSES Pot-grown on Own Roots; Never Throw Up "Suckers"

None of the roses we offer are dormant or field grown, but are well-branched two-year-old greenhouse pot-grown bushes with extra strong balls of fibrous roots and in full foliage; ready for quick and substantial results for planting out.

Ready for delivery about May 10th, weather permitting.

EVERBLOOMING HYBRID TEAS

One-year: Each, 35c; Three, \$1.00; Six, \$1.75; Dozen. \$3.00; postpaid. Two-year: Each, 75c; Three, \$2.00; Six, \$3.75; Dozen, \$7.00; postpaid. Dozen by express, charges

collect, \$6.00.

American Beauty. (Mme. Ferd. Jamin.) Rich red, passing to crimson; very delicately veined and shaded and surpassingly fragrant.

Columbia. Peach-blow pink, deepening as it opens to a glowing and enduring color. A large rose with long stiff stems nearly thornless; absolutely free from mildew and an easy doer.

Crusader. Rich, velvety crimson; heavily petaled, with big, double blooms.

blooms.

Etoile de France. (Star of France.)
A brilliant shade of clear redcrimson velvet, centering to
vivid cerise; large flowers on
long, stiff stems; remarkably
vigorous, free-blooming and hardy.

Francis Scott Key. Red, shading to cerise; very large, with a profu-sion of petals opening to a high center.

General McArthur. Brilliant scar-let, retaining its brilliancy when expanded to flowers of superb form. Free from mildew.

lley. Deep, rich, well-formed velvety crimson buds and large, double flowers.

Helen Gould. (Baldwin.) Long, beautiful buds and full, double flowers of warm, rosy-crimson; hardy everywhere.

Hoosier Beauty. Glowing crimson-scarlet with darker shadings; buds of good length and splendid shape.
A strong and clean grower, free from spot or mildew.

Jonkheer J. L. Mock. Clear imperial pink, reverse of petals rosy, silvery-white; blooms of magnificent size and form, produced freely on stiff, erect canes.

Kaiserin Augusta Victoria. Pure white, does not pink when planted out; splendid, large buds and superb, full, double blooms.

arney. (The Irish Beauty.) Brilliant sparkling pink with large, pointed buds, broad, wax-like petals with silvery edges and enormous semi-full flowers of exceeding beauty.

France. Silvery-rose, with pink shades and satin-like petals of unsurpassable beauty; large, symmetrical and deliciously fragrant blooms from June until frost; hardy La France. with protection.

Madame Butterfly. The buds are a lovely shade of Indian red, yellow at the base, the opening flowers are perfect in form and texture, clear and brilliant in color and of delicious fragrance.

Madame Jenny Guillemot. Deep saffron-yellow, opening canary with dark golden shadings; buds long and pointed; petals and blooms immense.

Mistress Aaron Ward. A most striking coloryellow shading to lemon-cream at edges of petals. Very large and full, of refined form, cupped and very deep, effectively showing the golden heart.

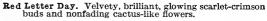
Mistress Charles Bell. (Shell-pink Radiance.) Flowers shell-pink on a salmon background.

Ophelia. Brilliant salmon-flesh shaded with rose on outer edges of petals, with a heart of glowing peach-pink and orange-yellow blendings, all passing finally to lighter shades; fragrant and immune to mildew and black spot.

President Taft. Shell-pink of a shining, intense and distinctive color; of beautiful, globular form, perfect in stem and handsome, glossy foliage.

Radiance. Brilliant rosy-carmine, shaded with rich opaline-pink tints in the open flower, which is large, full, of fine form, with cupped petals.

Red Radiance. A bright, cheerful and even shade of pure red; size, follage, growth and habit same as in the parent "Radiance;" an admirable nursery Rose.



burst. Orange-copper or golden-orange and golden-yellow, all intense shades, giving an extremely brilliant effect. A giant Rose, long stems, long, pointed buds.

White Killarney. A pure white sport from the pink parent.

NEW ROSES

Latest Merit Proven Introductions. One Year and Two Year

Amelia Gude. Color shade of "Sunburst" with touches of orange on the reverse, fancy yellow blooms of an individual beauty. One year, 45c each; two year, \$1.00 each.

Betty Uprichard. The inner face ty Uprichard. The inner face of petal is a delicate salmon-pink; to carmine, while the reverse is glowing carmine with coppery sheen and a suffusion of orange. One year, 50c each; two year, \$1.25 each.

Briarcliff. Deep rose-pink at center, passing to lighter on outer petals, with a touch of citrongreen at base. One year, 50c each; two year, \$1.25 each.

Commonwealth. Deep, dark pink flowers; bud large, long-pointed. Rich green, leathery and disease resistant foliage. One year, 45c each; two year, \$1.00 each.

den Ophelia. Bright golden-yellow, paling slightly at outer petals; medium sized and beautifully formed compact bud. One year, 40c each; two year, \$1.00 each.

La Champagne. Peach-blossom tinted outer petals, orange-yellow at base with chamois and apricot-yellow center. One year, 60c each; two year, \$1.50 each.

Lucie Nicholas-Meyer. Superb pink flowers, reverse of petal, rosy-flesh; the two shades combining with beautiful color effect. One year, 40c each; two year, \$1.00

Rev. F. Page Roberts. Rich "Marechal Niel" yellow, occasionally veined with buff markings in the bud and young stages; foliage not addicted to mildew. One year, 50c each; two year, \$1.25 each.

Roselandia. Sport of Golden Ophelia, but deeper yellow than parent; large flowers with high pointed center. One year, 50c; two year, \$1.25.

Rose Marie. Rich, red flowers of a bright watermelon shade. One year, 40c each; two year, \$1.00 each.

Sensation. Scarlet-crimson with maroon markings; of extremely large size and double; a prolific producer. One year, 40c each; two year, \$1.00 each.

Templar. A clear, even shade of red, never aging purple or blue; highly fragrant. One year, 40c each; two year, \$1.00 each.

Therese Zeimet-Lambert. rese Zeimet-Lambert. Delicate carmine-red on orange and chrome yellow ground, overspread with carmine-rose. One year, 50c each; two year, \$1.25 each.

TEA ROSES

Alexander Hill Gray. Deep lemon-yellow, similar in color to Marechal Niel, more intense as the bloom expands. One year, 35c each; two year, 75c each.

Maman Cochet. Rich, rosy-pink, shaded silvery-rose on outer petals; exquisite in color and graceful in form. One year, 35c each; two year, 75c each.

William R. Smith. Creamy-white with shadings of pink; beautiful in form and colors; glossy foliage; long, stiff stems. One year, 35c each; two year, 75c each.

(Roses Continued to Next Page)

We do not guarantee or replace Plants, Shrubs or Trees at prices quoted.

ROSES

Pot-grown, Pot-grown, on own ronever throw up "suckers" roots;

One-year: Each, 35c; Three, \$1.00; Six, \$1.75; Dozen, \$3.00; postpaid. Two-year: Each, 75c; Three, \$2.00; Six, \$3.75; Dozen, \$7.00; postpaid.

Dozen by express, charges collect, \$6.00.

HIYBRID PERPETUAL ROSES

 \mathbf{A} MONG all the hardy plants few are so commonly well liked or more valuable than the roses, particularly the "June Roses," as the Hybrid Perpetuals are called. They are strong growers, bearing large globular flowers and are so hardy that they succeed in any locality.



Boule de Neige. (Ball of Snow.) Pure white, showing light flesh upon opening; elegantly formed, very full and double.

Frau Karl Druschki. Long buds and magnificent snowwhite blooms with large saucer-shaped petals.

General Jacqueminot. Shapely buds and handsome blooms of bright, shining crimson, rich, brilliant, velvety and fragrant.

and fragran

Marshall P. Wilder. Deep, rich, glowing red; extra large, semi-globular and full; a very strong grower.

Mistress John Laing. Clear, bright, shining pink; immense, full blooms on long, stiff stems.

Paul Neyron. Bright, shining pink, clear and beautiful; very double and full; finely scented.

DWARF, POLYANTHA or BABY RAMBLER ROSES

White Baby Rambler. Red Baby Rambler. Pink Baby Rambler. Crimson Baby Rambler. Yellow Baby Rambler.

ROSA HUGONIS

It is an upright growing shrub with slender and spreading branches on which the fragrant flowers are borne in yard-long sprays of soft yellow, holding its foliage until late in the fall, when it assumes a dark purple tint. It makes a symmetrical bush about 6 feet in height and about the same in diameter, when fully developed. Perfectly hardy, flowers

We recommend this variety for hedges between properties and can supply strong healthy plants at \$1.00 each; \$10.00 per dozen; 25 for \$20.00; 100 for \$75.00.

NOTE:-If planters will use our Prepared Humus in planting Shrubs, Trees, Roses, Evergreens and Hardy Perennial Plants, and mulch them with Granulated Peat Moss, much of the loss due to imperfect planting will be eliminated. (See pages 77 and 78.

HARDY CLIMBING ROSES

Alida Lovett. Large buds and full blooms of ideal form; bright shell-pink, with rich sulphur at base of petals.

Bess Lovett. Clear bright red fragrant and lasting flowers of good size.

Christine Wright. Bright wild-rose pink; blooms singly and in clusters during June; immune from disease.

Climbing Clothilde Soupert. Ivory-white, shading toward center to silvery-rose; perfectly full and double.

Doctor W. Van Fleet. A delicate shade of flesh-pink deepening to rosy-flesh in the center; buds pointed, flowers full and double.

elsa. (Red Dorothy Perkins.) Intense crimson-scarlet; double flowers in brilliant clusters set in glossy, shining Excelsa. foliage which never mildews nor spots.

Gardenia. Bright yellow, opening cream; early flowering, fragrant and free. Called "The Hardy Marechal Neil."

Mary Wallace. Bright, clear rose-pink with salmon base to the petals; very large, shapely, free blooming. Pillar rose type with glossy, disease resistant foliage.

Paul's Scarlet Climber. l's Scarlet Climber. Vivid scarlet, shaded crimson, non-fading; semi-double flowers of medium size in large trusses produced in great profusion during an exceptionally long blooming period. Vigorous and free-branching habit with long healthy foliage.

Rosarie. True cerise-pink; good grower and producer; sport from "Tausendschoen."

er Moon. Clear silvery-white with a mass of bright yellow stamens; petals of splendid substance and beautifully cupped; exceedingly large and fragrant flowers; growth vigorous and very free blooming. Wichuraiana X Cherokee. Silver Moon.

TRAILING PLANTS

For Window Boxes, Hanging Baskets and Vases,

Ice Plant. This plant is largely used for hanging baskets, window boxes and vases. In addition to its trailing habit it produces pretty pink flowers and the plant is furnished with leaves of a fleshy texture. They should be largely used as they present a very striking appearance when in bloom......35c each; \$3.50 per dozen.

Thunbergia. (Black-Eyed Susan.) Beautiful rapid-growing climbers, preferring a warm, sunny situation; used extensively in hanging baskets, vases, low fences, etc.; very pretty flowers in buff, white, orange, etc.; with dark eyes; mixed colors... 25c each; \$2.50 per dozen.

Tradescantia. (Wandering Jew.) We have two varieties of this, Vittata and Aquatica. The Vittata is the white striped variety and the Aquatica has darker foliage. Both of these are largely used as house plants and require a very moist situation.

20c each; \$2.00 per dozen.

Vinca Vines. (Trailing Vinca.) Largely used and is a well known vine for hanging baskets, window boxes and vases, with bright green foliage striped with white.

25c each; \$2.50 per dozen.

Water Ivy. This is another trailing plant with bright attractive foliage, used in connection with the Trailing Vinca which makes a very effective display.

25c each; \$2.50 per dozen.

POSTAGE:—Prices do not include prepayments by mail or express. If wanted by mail, add for postage within third zone—5c each, or 15c per dozen.

Trailing Plants, when sent via Parcel Post, travel exclusively at buyer's risk.

BEDDING AND GARDEN PLANTS

THESE are all well grown plants. Grown in pots large enough to develop them properly. They will be forwarded in paper pots, so as to protect the roots. As a rule the plants will be in bloom or showing color.

We urge customers to have their plants forwarded via

express.

We can send them via parcel post, providing sufficient postage is sent with order, but can assume no responsibility whatever for damage in transit when sent this way.

We make no charge for packing.

AGERATUM (Floss Flower)

One of the very best bedding plants, with bright blue flowers; compact growth; fine bedder.

20c each; \$2.00 per dozen.

ALTERNANTHERA

Used principally for carpet bedding effects and edgings; fine for working out designs; of very dwarf growth, 4 inches

Aurea Nana. Green and yellow, mottled foliage.
Brilliantissima. Red, with a slight trace of green.

15c each; \$1.50 per dozen.

ASTERS

They should have an open, sunny position, and prefer a good, heavy loamy soil, enriched with a liberal quantity of thoroughly rotted manure.

10c each; \$1.00 per dozen.

BEGONIA VERNON

Deep red flowers and bronzy-red foliage. 20c each; \$2.00 per dozen.

CALENDULA (Pot Marigold)

Showy free-flowering hardy annuals, growing in any good garden soil, producing a fine effect in beds or mixed borders, continuing in bloom from early summer until killed by frost; valuable also for pot culture. 25c each; \$2.50 per dozen.

CANNA PLANTS

The Canna Plants we offer are grown by our specialist and The Canna Plants we offer are grown by our specialist and are widely and favorably known. Strong, healthy plants from 4 inch pots.

Cincinnati Yellow. A pure yellow flower without shadings of any kind, borne on strong, upright stalks three to four feet in height. Green foliage.

David Harum. Brilliant scarlet flowers; dark foliage.

David Harum. Brilliant scarlet flowers; dark foliage. 3 feet.

Dwarf Yellow Seedling. For edging. A variety growing about two feet high with light yellow flowers. Fine for bordering large beds of tall growing sorts. Green foliage. Gladiator. Deep yellow flowers, freely dotted with red. Green foliage. 4½ feet.

Madame Crozy. Orange scarlet flowers, edged with brilliant golden-yellow. Green foliage. 3 to 4 feet.

Mary Wallace. A rich, soft, crimson pink, flowers of large size, freely produced in great trusses on rigid, upright stalks. Green foliage. 3½ feet.

Mrs. A. F. Conard. Salmon-pink flowers of large size. Green foliage. 4 feet.

Mrs. Kate Gray. Rich orange scarlet, overlaid with gold; flowers large, with immense trusses, foliage bright glossy green; one of the best; 5 feet.

Orange Bedder. A fine variety with deep orange colored flowers, borne on strong stems. Green foliage. 4 to 5 feet.

The President. Flowers of immense size, of a rich glowing scarlet produced on strong erect stalks. Green foliage. 3 feet.

Yellow Humbert. Yellow flowers. Green foliage. 5 to 5½

Yellow Humbert. Yellow flowers. Green foliage. 5 to 5 1/2

Wyoming. Orange-scarlet flowers. Dark foliage. 5 to 5 ½ feet. All the above varieties, 25c each; \$2.50 per dozen;

All the above varieties, 25c each; \$2.50 per dozen; 25 for \$5.00; 50 for \$9.50; \$18.00 per 100.

CARNATIONS

Strong plants for summer flowering. Ready about June

1st.
Beacon. Color a clear, bright glowing scarlet; a continuous bloomer and distinct in color from any other sort.
Enchantress Supreme. A light salmon pink which does not bleach in the full sun and is not liable to split.
Matchless. This new white variety is well named, and well deserved the two gold medals that it won. Comes into bloom early and is a continuous bloomer.
Mrs. C. W. Ward. A perfectly formed, deep pink flower with strong, erect stems 24 to 36 inches in length. A vigorous, healthy grower and early and free bloomer. All the above varieties, 25c each; \$2.50 per dozen; \$18.00 per 100. 3½ inch pots.

POSTAGE:—Prices do not include prepay.

POSTAGE:—Prices do not include prepayment by mail, or express. If wanted by mail, add for postage within third zone—5c each, or 15c per dozen. Bedding Plants, when sent via Parcel Post, travel exclusively at buyer's risk.

COLEUS

Popular bedding plants with beautifully colored foliage. We can supply them in four colors. 15c each; \$1.50 per dozen.

CUPHEA (Cigar Plant)

Platycentra. Interesting bedding plant; the flower is shaped like a hollow cigar; color, scarlet with a black and white tip. 15c each; \$1.50 per dozen.

DUSTY MILLER (Cineraria Maritima)

Cut-leaved silvery-green foliage; used for edging. 20c each; \$2.00 per dozen.

GERANIUMS

Will always remain a popular bedding plant. We offer the four best varieties. Naomi. Double pink.

Naom. Double pink.
Sheridan. Single red.
S.A. Nutt. Double scarlet.
25c each; \$2.50 per dozen. 4 inch pots.
Beaute Poitevine. Finest salmon-pink. 35c each; \$3.50 per dozen. 4 inch pots.

HELIOTROPE (Cherry Pie)

Blooms during the whole season; its delightful perfume makes it a desirable bouquet flower; a fine bedding plant.

35c each; \$3.50 per dozen.

LANTANA

One of the most desirable bedding plants, constantly in bloom. A dwarf variety for bordering beds; color of bloom, orange-yellow. 20c each; \$2.00 per dozen.

MIGNONETTE

A well-known favorite. No garden is complete without a bed of Mignonette. 35c each; \$3.50 per dozen.

PANSIES

Choice Mixed. This strain is one of great excellence, the individual flowers being superb and include many fine shades in a number of colorings. 15c each; \$1.50 per dozen.

VINCA (Madagascar Periwinkle, or Old Maid)

Ornamental, free-blooming plants and one of the most satisfactory flowering bedding plants we have, blooming until frost

Rosea. Rose, dark eye.

Alba Rosea. White, crimson eye.

Alba Pura. Pure white.

20c each; \$2.00 per dozen.

PETUNIA

For outdoor decoration or house culture few plants equal the Petunia in effectiveness. Easily cultivated, only requiring

a good soil and sunny position.

Howard's Star. A beautiful free-flowering strain, crimson-maroon with a clearly defined five-pointed star of blush

Rosy Morn. Carmine-pink with white throat. Single Bedding Varieties, Mixed Colors. All the above, 15c each; \$1.50 per dozen.

Balcony Petunias

A splendid free-flowering type, for bedding, window boxes,

A spiendid ree-nowering type, for bedding, window boxes, vases and hanging baskets.

Balcony Blue. Rich velvety violet.

Balcony Rose. Brilliant rose-pink, very effective.

Balcony White. Pure white flowers, large and borne abundantly until frost.

All the above, 20c each: \$2.00 per dozen.

Large Double Mixed. Choice strains of fine colors and

large flowers 25c each; \$2.50 per dozen.

SALVIA (Flowering Sage)

Splendens. (Scarlet Sage.) One of the finest summer and fall plants with magnificent brilliant scarlet flowers. Small plants, 15c each; \$1.50 per dozen. Large Plants, 20c each; \$2.00 per dozen.

VERBENAS

They will make a lavish and showy display of flowers Fine Mixed. A very satisfactory assortment, containing many fine colors and shades.

15c each; \$1.50 per dozen.

HARDY HERBACEOUS PERENNIAL PLANTS

The steadily increasing demand for hardy plants has induced us to make arrangements whereby all the plants we offer are tested to determine their relative merits. Consequently, the amateur or professional gardener may rest assured that all the varieties offered will produce the desired effects, when judgment in arranging and care

will produce the deserved.

For such of our customers who are not acquainted with the different varieties, we shall be pleased to make suitable selections of the most desirable species, that once planted, with very little care, will keep the garden gay with flowers from the time frost leaves the ground until late in autumn.

All plants are forwarded on receipt of order (weather permitting),

unless instructed to the contrary, and are sent by Express, purchaser paying charges. We can forward plants by Parcel Post, and if wanted sent in this way add 5c each, or 30c per dozen. Six plants of a kind at dozen rate.

ACHILLEA (Milfoil or Yarrow)

Plants suitable for dry, sunny places. The dwarf kinds are useful for carpeting or for rockeries, the taller varieties as border plants.

Boule De Neige. (Ball of Snow.) An improved variety bearing pure white flowers of perfect form all summer. Fine for cut flowers. 40c each; 3 for 75c; \$2.50 per dozen.

Eupatorium. Flat heads of brilliant yellow flowers; finely cut foliage. Blooms all summer. 3 to 4 feet.

45c each; 3 for 90c; \$3.00 per dozen.

ACONITUM (Monkshood)

Summer and late autumn-flowering plants with bold spikes of hood-shaped flowers thriving in either sun or shade. The roots are poisonous and should not be planted where the tubers might be mistaken for vegetables.

Fischeri. A dwarf variety with pale blue flowers. 18 inches. er. 50c each; 3 for \$1.05; \$3.50 per dozen. September.

Napellus. (True Monkshood.) Large dark blue flowers in a raceme. July to August. 3 to 4 feet.

65c each; 3 for \$1.50; \$5.00 per dozen.

AGROSTEMMA (Rose Campion)

Erect growing plants with silvery foliage and showy flowers during June and July.

Coronaria. (Mullein Pink.) Bright rosy-crimson flowers; 2½ to 3 feet. 35c each; 3 for 60c; \$2.00 per dozen.

AJUGA (Bugle)

A useful plant for the rockery and for carpeting the

ground, particularly in shady positions, as under trees where grass will not grow.

Reptans Rubra. Grows 3 to 4 inches high, with large spikes of purplish-blue flowers in May. 45c each; 3 for 90c; \$3.00 per dozen.

ALYSSUM (Rock Madwort)

Very popular for beds, borders and winter flowering. Of easiest culture and very free blooming.

8axatile Compactum. (Basket of Gold, Gold Tuft, Rock Madwort.) A fine plant for the rockery or border, grows 1 foot high and produces broad flat heads of yellow flowers in May. 40c each; 3 for 75c; \$2.50 per dozen.

ANCHUSA ITALICA

Dropmore Variety. Remarkable for its free and continual flowering all summer and the beautiful gentian-blue of its flowers; grows about five feet high. 45c each; 3 for 90c; \$3.00 per dozen.

ANEMONE JAPONICA

(Japanese Wind-flower)

They grow two to three feet high and are in bloom from August till mid-November, furnishing abundant cut flowers and a brilliant display.

Queen Charlotte. Very large, semi-double flowers of La France pink, a color that is rare among hardy plants.

45c each; 3 for 90c; \$3.00 per dozen.

Whirlwind. Large, semi-double, white flowers.

45c each; 3 for 90c; \$3.00 per dozen.

ANTHEMIS (Marguerite)

Tinctoria. Handsome, finely cut foliage, and large, golden yellow flowers produced all summer. Succeeds in the poorest soil..35c each; 3 for 60c; \$2.00 per dozen.

ANTIRRHINUM (Snap Dragon)

They are undoubtedly one of the best cut flowers which can be grown, while for beds or borders they are a constant source of pleasure, being in flower all the time. Our collection embraces several colors in mixture. Not ready before May 10th.

35c each; 3 for 60c; \$2.00 per dozen.



AOUILEGIA (Columbine)

Charming hardy plants, with distinct clear-cut foliage, bearing in countless numbers through May and June exquisite clear blue, white, rose, yellow, purple and striped blossoms. They thrive well with ordinary garden culture, but do best in partially shaded nooks.

yellow variety, very attractive. 40c each; 3 for 75c; \$2.50 per dozen. Canadensis.

Coerulea. Flowers often three inches in diameter; the outer sepals deep lilac or blue, petals white, the deep blue spur tipped green. 45c each; 3 for 90c; \$3.00 per dozen.

hrysantha. (Golden Columbine.) Golden Yellow flowers with long spurs. 40c each: 3 for 75c; \$2.50 per dozen.

Long Spurred Hybrids. Beautiful variations from the standard type. 40c each; 3 for 75c; \$2.50 per dozen.

Mrs. Scott Elliot Hybrids. Wonderful colors with very long-spurred flowers. Best mixture grown. Our stock is from seed from this source, absolutely true strain. 45c each; 3 for 90c; \$3.00 per dozen.

Wayside Pink. A beautiful strain of nothing but clear pink colors. We do not think that they can be surpassed. 45c each; 3 for 90c; \$3.00 per dozen.

ARABIS (Rock Cress)

lpina. A desirable early spring flowering plant, adapted for edging and the rock garden, but does equally well in the border, forming a dense carpet, completely covered with pure white flowers, which last a long time in bloom.

40c each; 3 for 75; \$2.50 per dozen. Alpina.

ARMERIA (Sea Pink or Thrift)

Attractive dwarf plants forming evergreen tufts of bright green foliage, from which innumerable flowers appear in dense heads, on stiff wiry stems, from 9 to 12 inches high. They flower more or less continuously from early spring until late in the fall. Very useful in the rockery.

Laucheana Rosea. Bright rose. 3 to 6 inches. 40c (ach; 3 for 75c; \$2.50 per dozen.

ARTEMISIA

Lactiflora. A tall-growing plant of fine foliage and heads of small white flowers in August and September, which fill the garden with fragrance. 40c each; 3 for 75c; \$2.50 per dozen.

ASCLEPIAS (Butterfly Weed)

Showy native plants about 2 $\frac{1}{2}$ feet high, blooming during July and August.

Tuberosa. Brilliant orange-colored flowers. 40c each; 3 for 75c; \$2.50 per dozen.

We do not guarantee or replace Plants, Shrubs or Trees at prices quoted-

HARDY HERBACEOUS PERENNIAL PLANTS—Continued

ASPERULA (Woodruff)

Odorata. Heads of snowy white flowers in May. Erect habit, 6 to 8 inches high. Increases rapidly and is used for carpeting shady places and for edgings. 45c each; 3 for 90c; \$3.00 per dozen.

ASPHODELUS (Kings Spear)

Luteus. Tall spikes of bright yellow lily-like flowers; very fragrant; sword-like foliage; fine for borders. 45c each: 3 for 90c; \$3.00 per dozen.

AUBRIETIA (Rock or False Wall Cress.)

One of the daintiest and most delicately beautiful of all dwarf, creeping plants for carpeting beds or rockeries, forming brilliant sheets of blue, crimson or rose for many weeks. Massed on rockeries or in borders with white Arabis and yellow Alyssum, it forms a charming contrast. A gem for planting in crevices of rocks or wall, forming a cataract of color. Mixed colors. 40c each; 3 for 75c; \$2.50 per dozen. \$2.50 per dozen.

ASTERS (Michaelmas Daisies or Starworts)

The hardy sorts are entirely distinct from Annual Asters, being smaller in bloom, but produced in greater quantity.

Charm. Very double violet-blue flowers. 50c each;
3 for \$1.05; \$3.50 per dozen.

Elta. Double flowers of pale lilac. 50c each; 3 for \$1.05;

3 for \$1.05; \$3.50 per dozen.

Elta. Double flowers of pale lilac. 50c each; 3 for \$1.05; \$3.50 per dozen.

Erica. A beautiful clear pink; large double flowers. 50c each; 3 for \$1.05; \$3.50 per dozen.

Joan Vaughan. Large, semi-double flowers of deepest blue, 50c each; 3 for \$1.05; \$3.50 per dozen.

Lady Lloyd. A very fine, clear rose pink. Lasts exceedingly well. 50c each; 3 for \$1.05; \$3.50 per dozen.

Novae-Angliae Roseum Superbum. Color almost red and a profuse bloomer. 50c each; 3 for \$1.05; \$3.50 per dozen.

dozen.

Perry's White. The finest white Michaelmas Daisy yet introduced; perfect in habit and remarkably free flowering.

45c each; 3 for 90c; \$3.00 per dozen.

BAPTISIA (False Indigo)

Australis. Grows about 2 feet high with dark green, deeply-cut foliage and spikes of dark blue flowers in June. 40c each; 3 for 75c; \$2.50 per dozen.

BELLIS PERENNIS (English Daisy)

Double Flowering, white and pink.

25c each; 3 for 45c; \$1.50 per dozen.

BOCCONIA (Plume Poppy)

Cordata. A splendid plant, growing sometimes six feet high, bearing panicles of creamy-white flowers in July and August; makes a grand effect as a center in a hardy bed or a border background.

40c each; 3 for 75c; \$2.50 per dozen.

BOLTONIA (False Chamomile.)

Tall growing, showy plants, with flowers resembling hardy Asters, appearing in September.

Latisquama. Pink, tinted lavender, six feet. 40c each; 3 for 75c; \$2.50 per dozen.

CALLIRHOE (Poppy Mallow)

Involucrata. A showy trailing plant with finely divided foliage and rosy-crimson flowers, with white center; blooms all summer. 45c each; 3 for 90c; \$3.00 per dozen.

CAMPANULAS (Bell Flower)

CUP AND SAUCER CANTERBURY BELLS (Campanula Calycanthema)

Large semi-double flowers, each resembling a cup and

saucer.

Pink. Beautiful variety with charming pink flowers.

35c each; 3 for 60c; \$2.00 per dozen.

White. Similar to the preceding, but the flowers are white.

35c each; 3 for 60c; \$2.00 per dozen.

Blue. Beautiful light blue flowers.

35c each; 3 for 60c; \$2.00 per dozen,

CARNATION (Hardy Border)

Choice Mixed. Seedlings from seed supplied by a specialist. Strong plants that will furnish an abundance of flowers.

40c each; 3 for 75c; \$2.50 per_dozen.

CARYOPTERIS (Blue Spirea)

Mastacanthus Incana. Grows about 3 feet high and produces rich lavender-blue flowers in great profusion the whole length of the branches. Blooms continuously from early in September until cut by frost. 65c each; 3 for \$1.50; \$5.00 per dozen.



CATANANCHE (Cupid's Dart)

Coerulea. Heads of pretty deep blue flowers on long stems. Profuse bloomer and excellent cut flower. July and August. 2 feet. 45c each; 3 for 90c; \$3.00 per dozen.

CENTAUREA (Knapweed)

Montana. Large violet blue flower, resembling the Cornflower. Blooms from July to September. 2 feet. 40c each; 3 for 75c; \$2.50 per dozen.

CERASTIUM (Snow in Summer)

Tomentosum. Suitable for the rockery or for covering dry, sunny spots. Low growing plant with silvery foliage and white flowers in June. 40c each; 3 for 75c; \$2.50 per dozen.

CHELONE (Shellflower)

Lyoni. Grows about two feet high and bears numerous spikes of large flower heads of showy purplish red flowers. 45c each; 3 for 90c; \$3.00 per dozen.

CLEMATIS, DWARF (Shrubby)

Recta. Grows from 2 to 3 feet high and produces fragrant, pure white flowers in large, showy clusters during June and July. 60c each; 3 for \$1.35; \$4.50 per dozen.

COREOPSIS

Lanceolata Grandiflora. A beautiful hardy border plant; grows eighteen inches high, and produces its bright golden yellow flowers in great profusion the entire season........35c each; 3 for 60c; \$2.00 per dozen.

CHRYSANTHEMUMS

(Hardy Pompon)

These are becoming universally popular for bedding, as well as for cut flowers. They bloom profusely at a time when so many other flowering plants are destroyed by frost. While they are perfectly hardy they should be planted in a well drained position and protected with a light mulching in winter. Ready for delivery about May 1st.

Large Flowering and Button Varieties

Large Flowering and Button Varieti
Boston Orange. Orange bronze.
Bruno Poitivine. Velvety red.
Elkton. Light pink.
Excelsior. Bright yellow; Aster flowering.
Indian Red. Red over copper.
Jerry. Single white, tinted pink.
Mitzi. Bright yellow; button.
Oconto. White, large flowering.
Old Homestead. Salmon pink, Aster flowering.
Pride of Riga. Bright red; button.
Red Riding Hood. Deep red.
Zelia. Orange bronze, single.

25c each; \$2.50 m

25c each; \$2.50 per dozen .

HARDY HERBACEOUS PERENNIAL PLANTS-Continued

DELPHINIUMS

(Perennial Larkspur)

These are deservedly popular. They are perfectly nardy and will establish themselves in almost any garden soil, but respond quickly to liberal treatment. Will begin blooming about the middle of June. If stalks are cut off as soon as flowers fade, they will continue blooming all summer ing all summer.

ing all summer.

Belladonna Hybrids. The freest and most continuous bloomer of all. The clear turquoise-blue flowers are not surpassed by any; 3 feet.

40c each; 3 for 75c; \$2.50 per dozen.

Bellamosa. A dark blue of the type of Belladonna with the color of the old Formosum variety, but not liable to mildew like the latter and of stronger growth.

40c each; 3 for 75c; \$2.50 per dozen.

Giant Hybrids. Unquestionably the finest strain of mixed hybrids ever offered. The plants are of strong, vigorous habit, with large flowers on spikes two feet and over long.

hybrids ever offered. The plants are of strong, vigorous habit, with large flowers on spikes two feet and over long.

45c each; 3 for 90c; \$3.00 per dozen.
inensis. A pretty dwarf species, with fine feathery foliage and intense gentian-blue flowers in open panicles.

40c each; 3 for 75c; \$2.50 per dozen.
A pure white form of the above.

40c each; 3 for 75c; \$2.50 per dozen. Chinensis Alba.

DESMODIUM (Tick Trefoil)

Penduliflorum. A graceful shrub-like plant that dies to the ground in winter, but comes up vigorously in spring. Bears during September sprays of purplish-red flowers. 65c each; 3 for \$1.50; \$5.00 per dozen.

DIANTHUS (Hardy Pink).

New perpetual hardy flowering pinks. perfectly hardy and flower continuously from early spring until late in autumn; the flowers are much more substantial and larger than the old type of Hardy Pinks. and are borne on long stems suitable for cutting; deliciously clove

scented.

MIXED—Single and double; all colors. Strong field grown plants. 50c each; 3 for \$1.05; \$3.50 per dozen.

DICTAMNUS (Gas Plant)

Fraxinella Rubra. Forms a bush about 2½ feet in height, having fragrant foliage and spikes of rosy-pink flowers with deeper veins, during June and July. 65c each; 3 for \$1.50; \$5.00 per dozen.

DIELYTRA OR DICENTRA

Spectabilis. (Bleeding Heart or Seal Flower.) An old-fashioned favorite; its long racemes of graceful, heart-shaped pink flowers are always attractive; is perfectly at home in any part of the hardy border, and especially valuable for planting in the shade.

50c each; 3 for \$1.05; \$3.50 per dozen.

DIGITALIS (Foxglove)

The strong flowerstalks—frequently four to six feet high—rising from rich and luxuriant masses of leaves, always give an appearance of strength to the hardy border.

Giant Shirley Foxgloves. Of extraordinary size and vigor, growing 5 to 6 feet tall, with flower-heads over 3 feet long, crowded with big, bell-shaped blossoms. Colors range from white and shell-pink to deepest rose; many attractively dotted with crimson or chocolate.

45c each; 3 for 90c; \$3.00 per dozen.

Gloxiniaeflora. Finely-spotted varieties. White, purple, rose or mixed. 3 to 4 feet.
40c each; 3 for 75c; \$2.50 per dozen.

ECHINOPS (Globe Thistle)

ro. Interesting and showy thistle-like plants with globular heads of deep metallic blue flowers, which can be dried and remain attractive for a long time. 2 to 3 feet, 45c each; 3 for 90c; \$3.00 per dozen. Ritro.

EUPATORIUM (Hardy Ageratum)

A splendid native plant, growing 6 to 10 inches high; immense heads of purplish-pink flowers; fine for naturalizing along streams and ponds, and for planting among shrubbery.

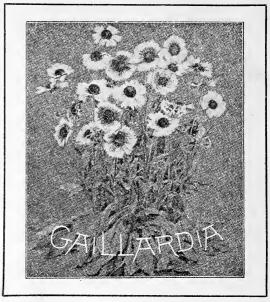
Coelestinum. Lavender flowers, similar to the Ageratum, blooms from August until frost.

40c each; 3 for 75c; \$2.50 per dozen.

FEVERFEW (Matricaria)

Little Gem. A most useful border plant and valuable summer cut flower, with large double white flowers; June until October: 18 to 24 inches high.

45c each; 3 for 90c; \$3.00 per dozen.



FUNKIA (Plantain Lily)

The Plantain Lilies are among the easiest plants to manage: their broad, massive foliage makes them attractive subjects for the border, even when not in flower. They succeed equally well in sun or shade.

Subcordata Grandiflora Alba. (White Day Lily, August Lily). Pure white, illy-shaped, fragrant flowers.

45c each; 3 for 90c; \$3.00 per dozen.

Undulata Variegata. Foliage green, striped with white.

40c each; 3 for 75c; \$2.50 per dozen.

GAILLARDIA (Blanket Flower) Grandiflora. Beginning to flower in June, they continue one mass of bloom the entire summer. Flowers three inches in diameter; center dark reddish-brown; petals orange to crimson. (See cut.)

40c each; 3 for 75c; \$2.50 per dozen.

GEUM

Coccineum. (Mrs. Bradshaw, Chiloense.) A splendid new variety, with large double flowers of a flery red, blooming nearly all summer. 18 inches. 45c each; 3 for 90c; \$3.00 per dozen.

GERANIUM (Crane's Bill)

Ibericum. Handsome serrated foliage. Large, lilac-blue flowers, blooming all summer; compact, bushy plants.

18 inches, 45c each; 3 for 90c; \$3.00 per dozen.

Sanguineum. Attractive foliage and bright crimson flowers. 18 inches, 45c each; 3 for 90c; \$3.00 per dozen.

G YPSOPHILA (Baby's Breath)

During August and September the plant is a mass of delicate feathery blooms. These may be used as fresh cut flowers, also for a semi-everlasting effect.

Paniculata. Loose, feathery sprays of white flowers, making a mist-like effect; fine for bouquets.

40c each; 3 for 75c; \$2.50 per dozen.

Repens. A beautiful trailing plant for the rockery, with clouds of small, white, flowers in July and August.

40c each; 3 for 75c; \$2.50 per dozen.

GRASSES, Ornamental. (See pages 12 and 28.)

HELENIUM (Sneezewort)

HELIANTHUS (Hardy Sunflower)

The perennial Sunflower is very effective either in borders, among shrubbery, or as clumps on the lawn, etc.

Maximiliana. Flowers in long, graceful sprays during October, when all others have finished flowering; five to seven feet...40c each; 3 for 75c; \$2.50 per dozen.

HARDY HERBACEOUS PERENNIAL PLANTS—Continued

HELIOPSIS (Hardy Zinnia)

cheriana. Very similar to a small sunflower, but blooming earlier; deep golden yellow; all summer, June till frost; 3 feet high. Pitcheriana. 40c each; 3 for 75c; \$2.50 per dozen.

HEMEROCALLIS (Yellow Day Lily)
Lily-like plants, which flower in greatest profusion Lily-like plants, during the summer.

Flava. The best known variety, very fragrant, deep lemonyellow flowers in June and July.

40c each; 3 for 75c; \$2.50 per dozen.

Dr. Regel. Handsome, rich orange-yellow flowers in May. Very fragrant. Fine for cutting. 1½ feet.
40c each; 3 for 75c; \$2.50 per dozen.

Thunbergii. Bears rich, buttercup-yellow, funnel-shaped flowers in July and August. 40c each; 3 for 75c; \$2.50 per dozen.

HESPERIS (Sweet Rocket)

Matronalis. Fragrant purple flowers in showy spikes.

Desirable for wild garden, shrubbery or mixed borders.

2 to 3 feet; June and July.

45c each; 3 for 90c; \$3.00 per dozen.

HEUCHERA (Alum Root)

Foliage remains close to the ground. During July and August the graceful, thin flower spikes, 12 to 18 inches appear in profusion. Sanguinea. Bright scarlet. 50c each; 3 for \$1.05; \$3.50 per dozen.

HIBISCUS (Mallow)

These are a mass of bloom during the entire summer, when they produce large flowers in gorgeous colors. Mallow Marvels, Giant-flowering. They grow from 5 to 8 feet high, and are very floriferous, blooming from early in July until late in autumn. We offer three distinct colors—red, pink and white—strong roots. 45c each; 3 for 90c; \$3.00 per dozen.

HOLLYHOCK

For planting in rows or in groups on the lawn, or for interspersing among shrubbery, they are invaluable. They require rich, deep soil, well drained.

Newport Pink. Finest pure pink, double flowering variety. 40c each; 3 for 75c; \$2.50 per dozen.

Double White, Double Rose, Double Yellow, Double Red, Double Mixed. 40c each; 3 for 75c; \$2.50 per doz.

Single Mixed. A wide range of colors. 35c each; 3 for 60c; \$2.00 per dozen.

HYPERICUM (St. John's Wort)

Moserianum. A desirable border plant of free and grace-ful habit, pruducing long, slender, much branched stems; leafy to the base and all drooping toward the ends, but the flowers face so that none of their beauty is lost. Flowers measure from 2 to 2 ½ inches in diameter, of rich golden vallow, with numerous reallow etamera and crincen golden yellow, with numerous yellow stamens and crimson anthers. Blooms the entire season. Height 2 feet.

55c each; 3 for \$1.20; \$4.00 per dozen.

IBERIS (Hardy Candytuft)

Sempervirens. Low growing, with evergreen foliage. In spring and early summer is completely covered with dense heads of pure white flowers. 45c each; 3 for 90c; \$3.00 per dozen.

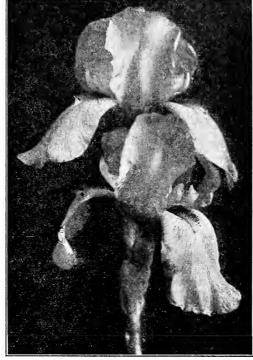
INCARVILLEA (Hardy Gloxinia)

Delayayi. Large, rich gloxinia-like rose colored flowers on 15 to 18 inch stems during June and July. Succeeds either in sun or shade, but should be well protected with leaves or litter during the winter.

55c each; 3 for \$1.20; \$4.00 per dozen.

LIBERTY IRIS (Iris Germanica) (Flag Iris) The "Fleur-de-Lis" of France

The Liberty Iris is one of the most desirable May flowering plants. The flowers are of large size and exquisite colors. For the best results plant in a well-drained sunny position barely covering the roots. Avoid fresh manure in preparing



Liberty Iris

25c each; \$2.50 per dozen.

Rhein Nixe. Standards white; Falls, violet-blue with white edge. ... 25c each; \$2.50 per dozen. Sherwin-Wright. This variety has splendid golden-yellow flowers without shading or markings. Strong, vigorous plants about two feet high. Flowers of good texture and lavishly produced. ... 40c each; \$4.00 per dozen.

All plants are forwarded on receipt of order (weather permitting), unless instructed to the contrary, and are sent by Express, purchaser paying charges. We can forward plants by Parcel Post, and if wanted sent in this way add 5c each, or 15c per dozen for postage within third zone. Six plants of a kind at dozen rate.

HARDY HERBACEOUS PERENNIAL PLANTS-Continued

JAPANESE IRIS (Iris Kaempferi)

They are most effective when planted in groups and thrive best in a moist soil. The flowers are of immense size, from six to eight inches in diameter, and of the most beautiful and delicate shades. They are perfectly hardy, flowering in great profusion during June and July.

Plant in rich soil early as possible in the fall, firm the ground well and cover lightly with straw or other litter.

We offer the following varieties: 50c each; \$5.00 per dozen.

azure. Double, mauve-blue with darker halo.
Dominator. Single. Rich indigo-blue.
Gold Bound. Double. Pure white, creamy glow.
Indo. Single. Rich dark blue, yellow center.
La Favorite. Large, white veined blue, purple center.
Minerva. Single. Pink tinted rose.
Mount Hood. Double. Light blue shaded dark blue.
Patrocle. Single. Superb dark reddish violet.
Purple and Gold. Double. Violet-blue, golden throat.
Pyramid. Double. Violet-purple veined white.
Reine Des Bulgares. Deep blue, white veins.
Shadow. Single. Reddish mahogany.
Finest Mixed (Our Selection). Our mixed varieties embrace a wide range of colors and markings. 35c each;
\$3.50 per dozen.

If wanted by mail, add 5c each; 30c per dozen for postage.

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IRIS PUMILA

These beautiful little Irises do not grow over 4 inches high, and bloom in April and May. They are fine for bordering flower beds or planting in front of the tall Irises.

Coerulea. Dark violet-blue. 25c each; \$2.50 per dozen. Excelsa. A splendid pale lemon yellow. 30c each; \$3.00 per dozen.

Schneecuppe. A large, showy, pure white. 25c each; \$2.50 per dozen.

LAVANDULA (Lavender.)

Vera. This is the true Sweet Lavender; grows about 18 inches high with delightfully fragrant blue flowers in July and August. Should be in every collection of Hardy Perennial Plants. 50c each; 3 for \$1.05; \$3.50 per dozen.

LIATRIS (Blazing Star, or Gay Feather)

Showy native plants, producing their large spikes of flowers from July to September.

Pycnostacha. Spikes of light, rosy purple flowers; five feet.

45c each; 3 for 90c; \$3.00 per dozen.

LINUM (Flax)

Perenne. A fine plant for the border or rockery; grows 2 feet high, with light, graceful foliage and large blue flowers all summer. 40c each; 3 for 75c; \$2.50 per dozen.

LOBELIA (Indian Paint Brush)

Cardinalis. (Cardinal Flower.) Rich, fiery cardinal flowers; strong plants often producing 10 to 18 spikes, 24 to 30 inches long. While they will thrive in ordinary garden soil, they prefer a moist, deep loam, where they will not suffer from drought. In bloom continuously from the middle of July till late in September. 40c each; 3 for 75c; \$2.50 per dozen.

LUPINUS (Lupine)

They grow about three feet high, producing large spikes of flowers, latter part of May and early June. Polyphyllus. Clear blue. 50c each; 3 for \$1.05; \$3.50 per dozen.

per dozen.

Albus. A white variety of above. 50c each; 3 for \$1.05; \$3.50 per dozen.

LYCHNIS

Chalcedonica. A desirable plant, growing two to three feet high; flowers brilliant orange scarlet. 35c each; 3 for 60c; \$2.00 per dozen.

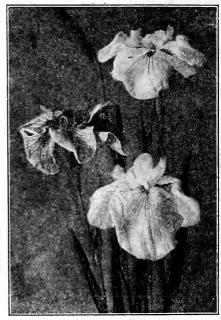
LYSIMACHIA

Clethroides. (Goose-neck, Loose-strife.) Grows about 2 feet high with long, recurved spikes of pure white flowers, from July to September. 45c each; 3 for 90c; \$3.00 per dozen.

Nummularia. (Creeping Jenny or Money-wort.) Valuable for planting under trees or shrubs where grass will not grow, where it quickly forms a dense carpet. 40c each; 3 for 75c; \$2.50 per dozen.

LYTHRUM

Roseum Superbum. (Rose Loose Strife.) A strong growing plant three to four feet high, producing large spikes of rose colored flowers from July to September. 40c each; 3 for 75c; \$2.50 per dozen.



Japanese Iris

MERTENSIA (Blue Bells)

Virginica. An early spring-flowering plant, growing about one to one and one-half feet high, with drooping panicles of handsome, light blue flowers, fading to clear pink; blooming in May and June. 40c each; 3 for 75c; \$2.50 per dozen.

MONARDA (Bergamot)

Showy plants, growing from two to three feet high, succeeding in any oil or position, with aromatic foliage, and producing their bright flowers during July and August. Didyma. Cambridge Scarlet. (Oswego Tea.) Flowers bright scarlet. 40c each; 3 for 75c; \$2.50 per dozen.

MYOSOTIS

Palustris Semperflorens. Large, rich blue flowers with yellow eye; a charming plant for damp places and a profuse bloomer. 40c each; 3 for 75c; \$2.50 per dozen.

OENOTHERA (Evening Primrose)

Elegant subjects for growing in an exposed, sunny position, either in the border, or on the rockery, blooming all summer.

Missouriensis. Large golden yellow flowers. 40c each; 3 for 75c; \$2.50 per dozen.

PACHYSANDRA (Japanese Spurge)

Terminalis. A ground cover, which will grow in all shady situations and the only plant which will thrive under pine trees. Of trailing habit, growing 6 to 8 inches high, forming broad mats of bright, glassy green foliage and small spikes of flowers during May and June. 40c each; 3 for 75c; \$2.50 per dozen.

PENTSTEMON (Beard Tongue)

Barbatus Torreyi. Spikes of brilliant scarlet flowers from June to August. Grows 3 to 4 feet high. 40c each; 3 for 75c; \$2.50 per dozen.

PEONIES

While these are only suitable for fall planting during the months of September, October and November, we have some demand from those who wish to complete their planting designs. For the convenience of those we will be pleased to submit a list of the sorts we can supply.

HARDY HERBACEOUS PERENNIAL PLANTS—Continued

HARDY PHLOX (Phlox Decussata)

Perennial Phloxes succeed in almost any soil enriched with manure in spring, and in hot weather an occasional soaking of water. If the first spikes of bloom are removed as soon as over, they will produce a second supply of flowers, continuing the display until late in Autumn. These later blooms are often finer than the first. (We offer nothing but strong, 2-year-old plants).

We offer the following collection of extra choice varieties. 40c ach; 3 of a kind for 75c; \$2.50 per dozen. 4this. Deep, clear salmon. Very fine.

Athis. Deep. clear salmon. Very fine.

Beacon. Brilliant cherry-red.

Champs Elysee. Fine, rich crimson.

Europa. A new variety, white with large crimson-carmine eye. Very large flower and truss.

Gefion. Tender peach-blossom pink with bright rose eye, creating a soft mauve effect. Flower and truss very large on erect, compact stems.

Jules Sandeau. Large, fine, very free flowering, pure pink.

pink.

La Vague. An improvement over older varieties of similar color, with immense, conical heads, borne in great profusion. Warm mauve with emphatic carmine eye.

Mrs. Jenkins. White; immense panicles; free-bloomer.

Rheinlander. A beautiful salmon pink, with flowers and trusses of immense size.

trusses of immense size.

Rijastroom. Lively rose-pink, much like Paul Neyron rose. Immense trusses of flowers. Thor. A beautiful lively shade of deep salmon-pink, suffused and overlaid with a scarlet glow; has aniline-red

White Lady. Very fine late pure white.

Any of the above varieties. 40c each; 3 of a kind for 75c; \$2.50 per dozen.

If wanted by mail, add 5c each; 30c per dozen; for postage.

PHLOXES OF SORTS

Divaricata Canadensis. It commences to bloom early in April and continues through May, with large, fragrant lavender flowers, on stems 10 inches high. 45c each; 3 for 90c; \$3.00 per dozen.

Subulata. (Moss or Mountain Pink.) An early spring flowering type, with pretty moss-like evergreen foliage, which, during the flowering season, is hidden under the masses of bloom.

Alba. Pure white. Rosea. Bright rose. 40c each; 3 for 75c; \$2.50 per dozen.

Suffruticosa. Miss Lingard. The best Phlox in cultivation. It produces immense heads of beautiful white flowers in June and blooms again in September and October. Splendid foliage and habit, and free from attacks of red spider. Better results will be had if old flowers are cut off. 50c each; 3 for \$1.05; \$3.50 per doz.

PHYSOSTEGIA (False Dragonhead)

Virginica. Forms large clumps 3 to 4 feet high, bearing long spikes of delicate pink flowers, tubular in form. July and August. 40c each; 3 for 75c; \$2.50 per dozen.

PHYSALIS (Chinese Lantern Plant)

ranchetii. An ornamental variety of the Winter Cherry, forming dense bushes about 2 feet high, producing freely its bright orange-scarlet lantem-like fruit which, when cut, will last all winter. Very attractive plant. 35c each; 3 for 60c; \$2.00 per dozen. Franchetii.

PLATYCODON

(Balloon Flower or Japanese Bell Flower)

Grandiflorum. Deep blue, cupped, star-shaped flowers, one and one-half feet. 40c each; 3 for 75c; \$2.50 per dozen. fariesi. Deep blue, bell-shaped flowers, nearly three inches across on one-foot-high plants. 40c each; 3 for 75c; \$2.50 per dozen.

PLUMBAGO (Lead Wort)

Larpentae. One of the most desirable border and rock plants. It is of dwarf, spreading habit, growing 6 to 8 inches high; covered with deep blue flowers during the summer and fall. 40c each; 3 for 75c; \$2.50 per dozen.

POLEMONIUM (Jacob's Ladder)

Reptans. (Greek Valerian.) Dwarf, bushy plant of graceful growth with showy blue flowers from April to June-A fine rock garden and border plant growing 8 to 10 inches high. 45c each; 3 for 90c; \$3.00 per dozen.

PRIMULA (Hardy Primrose)

ulgaris. The old English Primrose with pale yellow flowers. Should be in every garden. Blooms in early spring. 60c each; 3 for \$1.35; \$4.50 per dozen. Vulgaris.



POPPIES, ORIENTAL (Papaver Orientale)

POPPLES, ORIENTAL (Papaver Orientale)

The proper planting season for Oriental Popples is from the latter part of August till the end of October. Roots planted in spring seldom live and are usually disappointing to customers. Let us book your order for the following varieties for fall delivery.

Orientale. (Oriental Poppy.) Tremendous scarlet, cupshaped blooms of brightest crimson-scarlet, with large purplish black blotches at base of petals.

Orientale, Apricot Queen. Large apricot.

Orientale, Beauty of Livermore. Crimson, with black blotch; fine flowers.

Orientale, Mrs. Perry. Orange-apricot; very fine.

Orientale, Perry's White. (New.) The flowers are a fine satiny white with a crimson-maroon blotch at the base of each petal.

PYRETHRUM (Persian or Painted Daisy)

Hybridum. Of easy cultivation in any garden, as they are perfectly hardy. Nothing can surpass them in profusion of flowers from May to July and again later in the season if the flower stems are removed as soon as finished. The plants we offer embrace all the colors from deep red through the various shades of rose to pure white. These can be supplied in mixed colors only. 40c each; 3 for 75c; \$2.50 per dozen.

Uliginosum. (Giant Daisy.) Grows four to five feet high, and is covered with large, white, daisy-like flowers three inches in diameter from July to September. 40c each; 3 for 75c; \$2.50 per dozen.

DANUNCULULUS (Rustersum)

RANUNCULUS (Buttercup)

Repens, Fl. Pl. A pretty double flowering bright golden yellow Buttercup; flowers in May and June. 45c each; 3 for 90c; \$3.00 per dozen.

RUDBECKIA (Cone Flower)

A variety of these will furnish a supply of cut flowers from early July until September. They are extremely hardy, doing well with every one. They could be termed a city garden perennial," doing so well with little

termed "a city garden perennial," doing so well with little attention.

Golden Glow. Double canary yellow flowers; six feet; August. 35c each; 3 for 60c; \$2.00 per dozen.

Newmanni. Single dark orange, with deep purple cone center; three feet high; flowers from July to September. 40c each; 3 for 75c; \$2.50 per dozen.

Purpurea. (Giant Purple Cone Flower.) The flowers remain in perfect condition on the plants for weeks at a time. In fact, we do not know of any other perennial where the flowers last so long in perfect condition. Flowers from July to September; two and one-half feet high. 45c each; 3 for 90c; \$3.00 per dozen.

SALVIA

zurea. Grows two to three feet high and produces pretty skyblue flowers in great profusion during August and September. 40c each; 3 for 75c; \$2.50 per dozen.

HARDY HERBACEOUS PERENNIAL PLANTS—Continued

SAPONARIA (Soapwort)

Ocymoides Splendens. A fine plant for the rockery or border, producing masses of attractive bright rose flowers, May to August. 8 inches. 40c each; 3 for 75c; \$2.50 per dozen.

SAXIFRAGA (Megasea)

These will thrive in any kind of soil and in any position. Grow about 1 foot high and are admirable for the border or for shrubbery, forming masses of handsome broad, deep green foliage; flowers appear very early in spring. Fine among rocks or ledges.

Cordifolia. Light pink. Grassifolia, rosy pink. 55c each; 3 for \$1.20; \$4.00 per dozen.

SCABIOSA

Japonica. Bears lavender-blue flowers on long stems from July to Sept. 45c each; 3 for 90c; \$3.00 per dozen.

SCUTTELLARIA (Skull Cap)

Baicalensis Coelestina. Short, wiry stems, clothed with clear blue Snapdragon-shaped flowers. 1 foot. June to August. 50c each; 3 for \$1.35; \$3.50 per dozen.

SEDUM (Stone Crop)

Spectabilis. Erect growing; height 18 inches with broad, light-green foliage and immense heads of handsome, showy, rose-colored flowers. 45c each; 3 for 90c; \$3.00 per dozen.

Spectabilis Brilliant. Similar to the above with bright, amaranth-red flowers. 45c each; 3 for 90c; \$3.00 per

SHASTA DAISY

Large, snowy-white flowers, in bloom continuously throughout the summer and fall. Height 2½ feet.

Alaska. A decided improvement on the original, very free-flowering, with blooms 4½ to 5 inches across of pure, glistening white, 40c each; 3 for 75c; \$2.50 per dozen.

Mrs. C. Lothian Bell. This magnificent white Marguerite is undoubtedly the largest flowered variety of this class. Flowers frequently measure six inches across with very broad petals of great substance. 2½ to 3 feet. 45c each; 3 for 90c; \$3.00 per dozen.

SIDALCEA

Erect-growing, more or less branching plants, producing their showy flowers during June and July. They will succeed in any garden soil in a sunny position.

Rosy Gem. Pretty, bright rose-colored flowers 2 to 3 feet.

40c each; 3 for 75c; \$2.50 per dozen.

SILENE (Catchfly)

Alpestris. A dwarf rock plant, with dainty, pure white flowers in May and June. 40c each: 3 for 75c; \$2.50 per

SPIREA (Goat's Beard, Meadow Sweet)

Elegant border plants with feathery plumes of flowers and neat attractive foliage; succeed best in a half shaded

and neat attractive foliage; succeed best in a half shaded location in rich. moist soil

Filipendula. (Drop Wort.) Numerous corymbs of white flowers on stems 15 inches high; pretty fern-like foliage. June to July. 35c each; 3 for 60c; \$2.00 per dozen.

Filipendula, fl. pl. (Double Flowered Drop-wort.) Pretty fern-like foliage, with double white flowers on stems 15 inches high during June and July.

45c each; 3 for 90c; \$3.00 per dozen.

STATICE (Great Sea Lavender)

Latifolia. Immense heads, 2 to 3 feet across; small, blue flowers from June to September, which last for months if cut and dried. 45c each; 3 for 90c; \$3.00 per dozen.

STOKESIA (Cornflower of Stokes' Aster)

yanea. Produces showy, aster-like, deep blue flowers which measure from 4 to 5 inches across. 18 to 24 inches high, blooming freely from July until frost. 45c each; 3 for 90c; \$3.00 per dozen. Cyanea.

SWEET WILLIAM (Dianthus Barbatus)
Well known hardy plant. We offer a superb strain of mixed single and double-flowering sorts. 35c each; 3 for Newport Pink. Salmon or watermelon-pink flowers. 40c each; 3 for 75c; \$2.50 per dozen.

THALICTRUM (Meadow Rue)

Dipterocarpum. A pretty and distinct species, with flowers of a charming shade of lilac mauve, which is brightened by a bunch of lemon-yellow stamens and anthers. The plant is of strong growth, about 4 feet high. The dainty flowers are produced in graceful sprays, during August and September. 50c each; 3 for \$1.05; \$3.50 per



TROLLIUS (Globe Flower)

uropaeus. Orange Globe. Desirable free-flowering plants producing their giant bright yellow, buttercup-like blossoms on stems 1 to 2 feet high from May until August; succeed admirably in the border in a half shady position in well-drained soil. 50c each; \$5.50 per dozen. Europaeus.

TUNICA (Coat Flower)

Saxifraga. A pretty tufted plant with light pink flowers, produced all summer. Useful either for the rockery or border.
 40c each; 3 for 75c; \$2.50 per dozen.

VALERIANA (Valerian)

Officinalis. (Hardy Garden Hellotrope.) Produces showy heads of rose-tinted white flowers during June and July with delicious, strong heliotrope odor. 50c each; 3 for \$1.05; \$3.50 per dozen.

VERONICA (Speedwell)

Longifolia Subsessilis. A pretty species with blue flowers, produced on spikes a foot long, continuing in bloom the entire summer and fall. 45c each; 3 for 90c; \$3.00 per doz. Spicata. An elegant border plant, growing about 1½ feet high, producing long spikes of bright blue flowers. 40c each; 3 for 75c; \$2.50 per dozen.

VINCA MINOR (Periwinkle or Trailing Myrtle)

Dwarf evergreen trailing plant, is used for carpeting the ground where it stoo shady for other plants to thrive.

40c each; 3 for 75c; \$2.50 per dozen.

VIOLA CORNUTA (Tufted Pansies)

These plants will remain in bloom from May to October, providing they are sheared several times during the season to prevent them going to seed. They are fine for edging the hardy border or garden. Mixed colors.

40c each; 3 for 75c; \$2.50 per dozen.

YUCCA FILAMENTOSA (Adams' Needle)
A hardy ornamental foliage and evergreen plant with long, narrow leaves that are bright green the whole year round. The flowers are white, produced on long spikes.

45c each; 3 for 90c; \$3.00 per dozen.

ORNAMENTAL GRASSES

Eulalia Gracillima. (Japan Rush.) The most beautiful of all the Eulalias, with narrow, graceful foliage, entirely green without variegation, except that the midrib is of a silver sheen.

Eulalia Japonica Variegata. Leaves striped white and

green longitudinally. Eulalia Zebrina. (Zebra Grass.) A peculiar variegated grass, growing six feet high. The variegation is unlike that of any other plant, being across the leaf in regular bands, dark green and light. 40c each; 3 of a kind for 75c; \$2.50 per dozen.

When ordering Perennial Plants sent via Parcel Post, add 5c each or 15c per dozen, for postage within third

zone.

ORNAMENTAL FLOWERING SHRUBS

Shrubs are as much a part of the garden as the lawn or flower borders, and a well arranged planting presents an attractive appearance throughout the entire year.

Our Shrubs are transplanted every two or three years and are furnished with plenty of fibrous roots and should not be compared to stock that is never moved from the cutting beds until sold.

We do not guarantee or replace plants, shrubs or trees at prices quoted.

ALMOND. Double Flowering. A desirable class of early flowering shrubs, erect slender branches, covered with small double pink flowers. 2 to 3 feet. \$1.00 each;

LIHEA. (Rose of Sharon.) Valuable on account of their late season of blooming, which is from August to October. Are also extensively used as hedge plants. 2 to 3 feet. 60c each; \$6.00 per dozen. oule-De-Feur Derivities of the property of the season of the property of th ALTHEA. (Rose of Sharon.)

Boule-De-Feu. Double red. 2 to 3 feet. 60c each; \$6.00 per dozen.

Jeanne D'Arc. Double white. 2 to 3 feet. 60c each; \$6.00 per dozen.

Lady Stanley. Double blush white, crimson center. 2 to 3 feet. 75c each; \$7.50 per dozen.

2 to 3 feet. 75c each; \$7.50 per dozen.

Double Rose, White and Purple. 2 to 3 feet. 60c each;

BERBERIS THUNBERGII. (Japanese Barberry.) One of the most beautiful shrubs either for hedging or general purposes.

12 to 18 inches, 30c each; \$3.00 per dozen.

18 to 24 inches, 40c each; \$4.00 per dozen;

24 to 30 inches, 60c each; \$6.00 per dozen;

NEW RED LEAVED JAP-ANESE BARBERRY.

One year plants 75c each; \$7.50 per dozen.

Two year plants \$1.00 each; \$10.00 per dozen.

Three year plants \$2.00 each; \$20.00 per dozen.

BUDDLEYA. (Butterfly Shrub or Summer Lilac.) Variabilis Magnifica. Flow-Variabilis Magnifica. Flowers are the shape and color of lilacs. Flowers all season. 50c each; \$5.00 per

CALLICARPA. Purpurea. Clusters of bright glossy, violet-purple berries are borne in September remaining on the plant until mid-winter. 75c each; \$7.50 per dozen.

per dozen.

CALYCANTHUS FLORIDUS. (Sweet-Scented Shrub.)
Flowers fragrant, double and of a chocolate color. Blooms in April. 1½ to 2 feet. 75c each; \$7.50 per dozen.

CERCIS CANADENSIS. (Judas Tree or Red Bud.) All the branches and twigs are covered with a mass of small pink flowers early in the spring, before the leaves appear. 2 to 3 feet. 75c each; \$7.50 per dozen.

CLETHRA ALNIFOLIA. (Sweet Pepper Bush.) Dark green foliage and upright spikes of creamy white, fragrant flowers in August. 1½ to 2 feet. 75c each; \$7.50 per dozen.

ORCHORUS. (Kerria.) Globe Flower or Japanese Rose. Japonica. Flowers bright yellow, large and showy. 1½ to 2 feet. 75c each; \$7.50 per dozen.

CORNUS FLORIDA. (White Flowering Dogwood.) Flowers white and very showy. 2 to 3 feet. \$1.00 each; \$10.00 per dozen.

CORNUS FLORIDA RUBRA. (Red Flowering Dogwood.)
The flowers are rich, rosy-red. 3 to 4 feet. \$5.00 each; \$50.00 per dozen.

CORNUS MASCULA. (Cornelian Cherry.) Clusters of bright yellow flowers early in spring which are followed by red berries. 2 to 3 feet. 75c each; \$7.50 per dozen.

RAB. (Bechtel's Double Flowering.) Most beautiful of all the flowering Crabs; hardy. Trees are covered in early spring with large beautiful, double, fragrant flowers, resembling small roses of a delicate pink. 3 to 4 feet. \$1.50 each; \$15.00 per dozen.

that dies to the ground in winter, but comes up vigor-ously in spring. Bears during September sprays of rose-colored flowers. 1½ to 2 feet. 90c each; \$9.00 per dozen.

DEUTZIA CRENATA FLORA PLENA. Flowers double white, tinged with pink. 2 to 3 feet. 60c each; \$6.00 per dozen.

DEUTZIA GRACILIS. A dwarf bush, covered with spikes of pure white flowers in early summer. 12 to 18 inches. 75c each; \$7.50 per dozen.

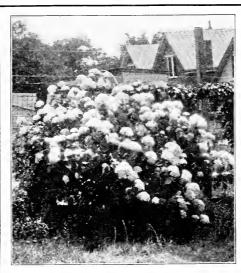
DEUTZIA LEMOINEII. Habit dwarf, flowers white. One and one-half to two feet. 75c each; \$7.50 per dozen.

DEUTZIA PRIDE OF ROCHESTER. Large double white flowers, slightly tinted with rose. 2 to 3 feet. 50c each; \$5.00 per dozen.

ELDER, GOLDEN. (Sambucus.) Golden yellow foliage. 3 to 4 feet. 75c each; \$7.50 per dozen.

ELEAGNUS LONGIPES. Nearly evergreen. Yellowish flowers in May, followed by scarlet-yellow berries during summer. 2 to 3 feet. 75c each; \$7.50 per dozen.

EXOCHORDA GRANDIFLORA. (Pearl Bush.) The early buds look like pearls, opening up to long gleaming sprays of pure white. 1 ½ to 2 feet. \$1.25 each; \$12.50 per dozen.



HYDRANGEA ARBORESCENS STERILIS (Snowball-Hydrangea)

FORSYTHIA SUSPENSA.
(Weeping Golden Bell.)
Willowy growth and yellow
flowers. 2 to 3 feet.
50c each; \$5.00 per dozen.

FORSYTHIA ISSIMA. (Golden Bell.) Erect growth and spreading branches; flowers bright yellow. 2 to 3 feet. 50c each; \$5.00 per dozen.

HYDRANGEA ARBORES-CENS STERILIS. (Snow-ball Hydrangea.) Snowy white bloom; will flower for fully three months; a very showy variety, excellent for borders. (See cut.) 18 to 24 inches. 60c each; \$6.00 per dozen.

HYDRANGEA PANICULATA GRANDIFLORA. The flowers which are borne in dense pryamidal panicles in the greatest profusion, are white when they first open but gradually change to rose and remain in good condition for weeks. 18 to 24 inches, 600 each; \$6.00 per dozen. 2 to 3 feet, 75c each; \$7.50 per dozen.

HYDRANGEA PANICULA-TA GRANDIFLORA. Standard or Tree-Shaped

Plants. These are four and five years old, trained to tree shape with about three feet of straight stem and nicely shaped heads. Four to five feet. \$2.25 each; \$22.50 per dozen.

HYPERICUM AUREUM. (Golden Hypericum.) A dwarf shrub growing to about 3 feet. Foliage bluish green above and paler beneath. Flowers yellow, nearly 2 inches across. Excellent for massing in front of taller shrubs. July and August. 1½ to 2 feet. 75c each; \$7.50 per

ILAC. Purple. (Syringa Vulgaris.) Purple flowers. White. (Syringa Vulgaris Alba.) White flowers. 3 to 4 feet. 75c each; \$7.50 per dozen. Prices of any of the following named Lilacs, fine plants. 2 to 3 feet. \$1.00 each; \$10.00 per dozen. LILAC.

Charles X. Reddish purple flowers.

Michael Buchner. Double pale-lilac flowers.

Madame Lemoine. Double white flowers.

LONICERA. (Bush or Upright Honeysuckle.)

Corrowi. White flowers during May, followed by red fruit during the summer and autumn months. 2 to 3 feet. 60c each; \$6.00 per dozen.

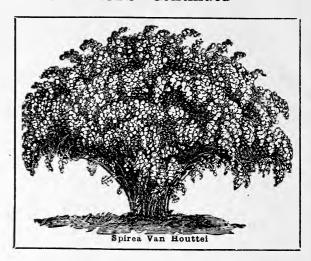
Tartarica. (Tartarian Honeysuckle.) Flowers red and white. Fruit red or orange. 2 to 3 feet. 60c each; white. Fruit re \$6.00 per dozen.

ORNAMENTAL FLOWERING SHRUBS—Continued

- PHILADELPHUS or SYRINGA. Grandiflorus. (Large flowered Mock-Orange.) Flowers are pure white and very large. 2 to 3 feet. 60c each; \$6.00 per dozen.
- PHILADELPHUS VIRGINAL. Produces an immense mass of beautiful white flowers and blooms all summer. 1½ to 2 feet. 75c each; \$7.50, per dozen.
- PRUNUS PISSARDI. (Purple Leaved Plum.) One of the best of the small red or purple leaved trees, holding much of its color through the summer. Flowers small and pinkish white. 75c each; \$7.50 per dozen.
- **RHODOTYPOS.** Kerrioides. (White Kerria.) Handsome foliage and large single flowers in the latter part of May, succeeded by numerous black berries. 2 to 3 feet. \$1.00 each; \$10.00 per dozen.
- RHUS COTINUS. (Purple Fringe, or Smoke Tree.)
 A low, shrubby tree, covered in midsummer with
 large clusters of feathery flowers, giving the appearance of a cloud of smoke or mist. \$1.50 each;
 \$15.00 per dozen.
- will thrive in dry soil, growing to a considerable height. Leaves are dark green, turning to scarlet, purple and orange in the fall. The crimson fruits remain on all winter. \$1.50 each; \$15.00 per dozen.
- ROBINIA HISPIDA. (Rose Acacia.) A very handsome shrub. The leaves are similar to those of the Locust. In June and July long panicles of rose colored flowers hang from the branches. 2 to 3 feet. 75c each; \$7.50 per dozen.
- SAMBUCUS. Aurea. (Golden Elder.) Attractive golden foliage and desirable to mix with other shrubs. 3 to 4 feet. 75c each; \$7.50 per dozen.
- SPIREA. A large group of showy, free-flowering, hardy shrubs.
- Anthony Waterer. Makes nice, round bushes, three feet; beginning to bloom in summer, continuing until fall. Rose red flowers in large, round clusters all over the bush. 12 to 18 inches. 50c each; \$5.00 per dozen.
- Billardii. Pink flowers in bloom nearly all summer. It is grand for planting in masses. 2 to 3 feet. 60c each; \$6.00 per dozen.
- Callosa Alba. A white flowering variety of dwarf, bushy, symmetrical form. Blooms all summer. 18 to 24 inches. 60c each; \$6.00 per dozen.
- Prunifolia Fl. Pl. (Old Bridal Wreath.) Blooms in May, with pure white, double flowers. 2 to 3 feet. \$1.00 each; \$10.00 per dozen.
- Reevesii Fl. Pl. Tall, with dark, bluish green foliage, and large, double, pure white flowers in May and June.
 2 to 3 feet. 45c each; \$4.50 per dozen.
- Sorbifolia. (Ash Leaf Spirea.) This shrub at maturity grows from 6 to 15 feet tall and its claim to recognition lies not alone in its perfect hardiness, but the unique effect it offers with its delicate green foliage, Mountain Ash like in form but fern-like in texture. Appearing early in the spring, the foliage is a distinct factor in the beauty of the shrub throughout the season. 2 to 3 feet. 75c each; \$7.50 per dozen.
- Thunbergii. Of dwarf, graceful form. Branches slender and somewhat drooping; foliage narrow and yellowish green; flowers small, white, appearing early in spring. 2 to 3 feet. 75c each; \$7.50 per dozen.
- Van Houttei. (Improved Bridal Wreath.) This is without a doubt the most beautiful and useful of shrubs. Always effectlye if planted singly or in groups on lawn, in front of porch, in shrub borders or in a hedge. Handsome throughout the entire season, but when in flower it is a complete fountain of white bloom. Clusters of white florets are set close along the drooping stems. (See cut.)

 Two to three feet, 35c each; \$3.50 per dozen.

 Three to four feet, 45c each; \$4.50 per dozen.
- 8 YMPHORICARPUS. Racemosus. (Snowberry.) Flowers white or pinkish, in loose racemes in summer. Berries white, produced in showy, profuse clusters, the branches bending under their weight. 2 to 3 feet. 60c each; \$6.00 per dozen.
- **8YMPHORICARPUS.** Vulgaris. (Coral-Berry or Indian Currant.) A grand shrub, producing a wealth of red or purplish berries, which remain on the branches all winter. Flowers greenish red in summer. Does well in shade. 2 to 3 feet. 60c each; \$6.00 per dozen.



- TAMARIX. Africana. (Tamarisk.) Strong, slender, tall growing, irregular shrubs, with feathery foliage and small delicate pink flowers in May. 2 to 3 feet. 60c each; \$6.00 per dozen.
- TAMARIX. Hispida Aestivalis. A graceful shrub with upright branches, flowers pink, appearing in July and August. 2 to 3 feet. 75c each; \$7.50 per dozen.
- VIBURNUM. (Snowballs and High Bush Cranberry.) The Viburnums are one of the most useful shrubs, being very hardy and of good habit. They all have white flowers mostly on flat heads and with a few exceptions are noted for their handsome clusters of berries.
- Lantana. (Wayfaring Tree.) This is especially suitable for dry situations and limestone soil. The large, white flower clusters open in May and June and are followed by red fruits, changing to black. 12 to 18 inches. 45c each; \$4.50 per dozen.
- Opulus. (High Bush Cranberry.) The white flowers in June are followed in autumn by bright scarlet berries, which are very attractive until late in winter. 18 to 24 inches. 75c each; \$7.50 per dozen.
- Opulus Sterilis. (Gailder Rose or Snowball.) Of spreading habit, bearing flat clusters of single white flowers, which afterwards produce brilliant red berries which hang to the plant all winter; very decorative. 2 to 3 feet. \$1.00 each; \$10.00 per dozen.
- Plicatum. (Japan Snowball.) One of the choicest hardy shrubs, with healthy dark foliage; the perfect balls of pure white flowers are borne in great profusion in May. 2 to 3 feet. \$1.25 each; \$12.50 per dozen.
- Tomentosum. (Single Japan Snowball.) A handsome shrub with beautiful, dark green leaves. Flowers white, borne in flat clusters in May. In autumn, foliage turns to a rich crimson. 18 to 24 inches. \$1.00 each; \$10.00 per dozen.
- VITEX AGNUS-CASTUS. (Chaste Tree.) A tall-growing shrub with extremely showy, dark green, aromatic foliage. Flowers lilac, borne in dense, drooping clusters. A rare shrub and very ornamental for lawn planting. July and August. 2 to 3 feet. 90c each; \$9.00 per dozen.
- WEIGELIA. (Diervilla.) These shrubs bloom after the lilacs in June and July. Their large flowers are of wide trumpet-shape, colors from white to red, and borne in clusters thickly along the branches.
- Candida. White flowering Weigelia, flowering throughout the summer. 2 to 3 feet. 75c each; \$7.50 per dozen.
- Eva Rathke. The finest Weigelia in cultivation. Flowers continuously throughout the summer and autumn; of an entirely distinct color, being a rich, ruby carmine. Should be in every garden. 2 to 3 feet. 75c each; \$7.50 per dozen.
- Rosea. A beautiful shrub, with rose-colored flowers in May and June. 2 to 3 feet. 60c each; \$6.00 per dozen.
- Rosea Nana Variegata. A neat dwarf shrub, valuable for the clearly defined variegation of green, yellow and pink in its leaves; flowers delicate rose and pink; one of the finest variegated-leaved shrubs. 2 to 3 feet. 90c each; \$9.00 per dozen.

HARDY CLIMBING PLANTS

THE need of vines for home improvement is well known, and there is absolutely nothing that adds more to the beauty of the home than appropriate vines. A porch without a vine is desolate and incomplete. Vines are exceptionally valuable for turning unsightly fences and buildings into things of beauty.

AKEBIA OUINATA (Akebia Vine)

One of the most graceful of our hardy climbers, with deep green, small foliage, and producing in early spring numberless bunches of violet brown flowers, which have a pleasant cinnamon odor; most desirable for positions where a dense shade is not required. Strong plants, 50c each; \$5.00 per dozen.

brownish-colored nowers, resembling a pipe in shape.

Has fine, large, green leaves.

\$1.50 each; \$15.00 per dozen.

BIGNONIA RADICANS. (Trumpet Creeper.) Should be grown on posts, stumps, etc. Flowers trumpetshaped, bright scarlet... 45c each; \$4.50 per dozen.

CELASTRUS SCANDENS. (Climbing Bitter Sweet.)

Hardy ornamental vine with yellow flowers, followed



bloomer, flowers creamy white, becoming fully expanded when grown in the sun. It blooms through August and September . . \$1.00 each.

JACKMANII. One of the best-known of all the clematises. The velvetyall the clematises. The velvety-purple flowers, when expanded, are four to six inches across, very velvety and distinctly veined.

\$1.00 each.

CLEMATIS (Small Flowering) PANICULATA. This Clematis is by far the most popular of all the species in American gardens. It is extremely showy when covered with the small, white fragrant flowers

MAD. ED. ANDRE. This is the nearest approach to a bright red Clematis. It is a very free bloomer and very satisfactory......\$1.00 each.

We send out strong, healthy roots of Clematis and cannot entertain any claims for non-success with these plants.

which appear late in the season.



lises....25e each; \$2.50 per dozen.

POLYGONUM AUBERTI. (Silver
Lace Vine.) One of the most desirable flowering climbers. The plant
is of strong, vigorous growth,
attaining a height of 25 feet or more,
producing through the summer and
fall great foamy sprays of white
flowers, and a well-established plant
during its long flowering period is a
mass of bloom. We have received
numerous expressions of praise from
our customers regarding this vine.
75c each; \$7.50 per dozen.

VITIS HETEROPHYLLA VARIE-VITIS HETEROPHYLLA VARIE-

end of August.

200 each; \$2.00 per dozen.

MATRIMONY VINE. The branches
may be trained over fences or trellises....25e each; \$2.50 per dozen.

atis

GATA. Dark green foliage, variegated with white and pink.

Each, 30c to \$1.00.

WISTARIA, CHINESE PURPLE. Has pale green pinnate leaves and bears profusely dense drooping clusters of purplish pea-shaped flowers. It blooms in May and usually gives a smaller crop of blooms in August or September. They should be liberally fed when first planted to give them a vigorous start..75c each; \$7.50 per dozen.

WISTARIA CHINESE WHITE. Of similar habit of CHINESE growth to the above, but with white flowers.
75c each; \$7.50 per dozen.

MONTHLY FRAGRANT OR DUTCH. Blooms all summer 50c each; \$5.00 per dozen. HALLEANA. (Hall's Japan Evergreen Honeysuckle.) The flowers are white, turning to yellow, and are very fragrant. 50c each; \$5.00 per dozen. IVY. English. An invaluable evergreen variety used for **TENDER**

60c each; \$6.00 per dozen.

HONEYSUCKLES

v. English. An invaluable evergreen variety, used for covering walls, etc.; has become very popular for covering graves, especially if in the shade, where grass will not succeed. succeed.

50c each; \$5.00 per dozen.

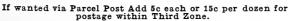
CLIMBING PLANTS

MOON FLOWER PLANTS.

25c each; \$2.50 per dozen.

If wanted by mail, add 5c each; 50c per dozen for postage.

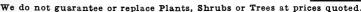
MADEIRA VINE. Strong tubers. 5c each; 40c per dozen. By mail, 50c per doz.







Aristolochia



EVERGREEN TREES

ARBORVITAE AMERICAN (Thuya Occidentalis)

They are very quick growers and may be trimmed to any desired height. Fine for hedges.

2 to 3 feet. \$2.50 each; \$25.00 per dozen.

3 to 4 feet. \$4.00 each; \$40.00 per dozen.

ARBORVITAE PYRAMIDALIS (Thuya Occidentalis Pyramidalis)

Suitable for tubs and forms a tall, slender column of densely branched, dark green foliage. A very graceful tree, having a number of uses.

\$4.25 each; \$42.50 per dozen. \$5.25 each; \$52.50 per dozen. 2 to 3 feet. 3 to 4 feet.

ARBORVITAE GLOBE (Thuya Occidentalis Globoso)

A dense, dark green form of the arborvitae, growing naturally in globe form. Dwarf habit.

1 to 1 ½ feet. \$2.25 each; \$22.50 per dozen.

IRISH JUNIPER (Juniperus Hibernica)

A narrow, columnar form, with upright branches, deep green, tips of branchlets erect. 2 to 3 feet. \$3.25 each; \$32.50 per dozen.

WEEPING TREES

BIRCH. (Cut-leaf Weeping.) A tree of wonderful grace and beauty. Tall, slender, drooping branches and delicately cut leaves. It colors brilliantly in the fall. Its bare white trunk and branches make a beautiful winter picture. 5 to 6 feet. \$5.00 each; \$50.00 per doz.

MAPLE. Weir's Cut-Leaf Weeping. This variety of the maple has very pendulous branches and the leaves are deeply cleft. A beautiful specimen tree, with a distinct half-drooping habit. Admirably adapted for lawns. 6 to 8 feet. \$2.25 each; \$22.50 per dozen.

MULBERRY, TEAS' WEEPING. The most graceful hardy weeping tree in existence. Forms a perfect-shaped head and the slender branches grow downward parallel with the stem, forming an umbrella-like shape. It takes the foremost place among weeping trees; has beautiful foliage and luscious fruit, is hardy, enduring the cold of the North and the heat of the South, safe and easy to transplant. Admirably adapted for ornamenting small or large grounds, or for cemetery planting. 2 year heads, \$4.00 each.

TLLOW. Wisconsin. A large tree with drooping branches. Leaves are bright green. Excellent for wet locations, but a credit to any lawn. 6 to 8 feet. \$1.75 each; \$17.50 per dozen. WILLOW.

AUSTRIAN PINE (Pinus Austriaca)

This species is very popular for grouping or as specimens. 2 to 3 feet. \$2.50 each; \$25.00 per dozen.

SCOTCH PINE (Pinus Sylvestris)

This grows to be a large tree, 70 to 120 feet in height; quite hardy....3 to 4 feet. \$3.25 each; \$32.50 per dozen.

WHITE PINE (Pinus Strobus)

A valuable, ornamental, hardy pine, of rapid growth. 2 to 3 feet. \$2.25 each; \$22.50 per dozen.

DWARF MUGHO PINE (Mughus)

This pine is very valuable in habit, with dark brown branches, bright green leaves, stout and acutish. The tree is broader than it is high, forming a dark, dome-shaped bush, 12 to 18 inches. \$3.25 each; \$32.50 per dozen.

NORWAY SPRUCE (Picea Excelsa)

This tree is extensively planted in many of the States. It is of rapid growth, with graceful habits and dark green foliage. It is one of the best conifers to plant for shelter foliage. It is or and windbreaks.

1 ½ to 2 feet. 2 to 3 feet. 3 to 4 feet. \$1.75 each; \$17.50 per dozen. \$2.25 each; \$22.50 per dozen. \$3.25 each; \$32.50 per dozen.

HEDGE PLANTS

CALIFORNIA PRIVET. (Ligustrum Ovalifolium.) most advantageous manner of planting is in doublerows, the two rows being about 8 inches apart. The plants should be set 12 inches apart in the row, alternating the plants. In order to secure a dense hedge from the base up, the plants should be severely pruned the first two seasons.

18 to 24 inches. \$1.00 per dozen; \$4.50 per 100. 24 to 30 inches. \$1.20 per dozen; \$6.50 per 100.

LTHEA. (Rose of Sharon.) Few are aware of the strikingly attractive characteristics of this perfectly hardy and profuse flowering shrub, when used as a hedge plant or as a screen. Plant 15 to 18 inches apart. 25c each; \$2.50 per dozen; \$18.00 per 100. ALTHEA.

ERBERIS THUNBERGII. (Japan Barberry.) Where a low, dwarf deciduous hedge is wanted, nothing equals this beautiful Barberry. Requires but little pruning to keep it in shape. Plant 12 to 15 inches apart. 12 to 18 inches. \$2.50 per dozen \$20.00 per 100. RERRERIS THUNBERGII.

SPIREA VAN HOUTTEI. An ideal flowering shrub to use as a dividing line between properties. Plant 18 to 24 inches apart. 40c each; \$3.50 per dozen.

FRUIT TREES, SMALL FRUITS, GRAPE VINES, ETC.

Select thrifty young trees in preference to old or very large ones, as the roots are more tender and fibrous. They bear transplanting better and are more apt to live; they can also be more easily trimmed and shaped to any desired form and in the course of a few years will usually out-strip the older ones in growth. If not prepared to plant when your stock arrives, "heel in" by digging a trench deep enough to admit all the roots and setting the trees therein, carefully pack the earth about the roots, taking up when required. Never leave the roots exposed to the sun and air.

SENT BY EXPRESS AT EXPENSE OF PURCHASER.

APPLES—STANDARD

5 to 7 feet high, 90c each; \$9.00 per dozen.

SUMMER VARIETIES

EARLYSHARVEST. Pale yellow, fine flavor; August. RED ASTRACHAN. Large, crimson, juicy, with rich subacid flavor; hardy; July. YELLOW TRANSPARENT. Pale yellow; good quality.

AUTUMN VARIETIES

DELICIOUS. Large, dark red, juicy, aromatic.
DUCHESS OF OLDENBURG OR DUCHESS. Large,
rounded, yellow, striped red, tender, juicy.
FALL RAMBO. Yellow, streaked with red.
MAIDEN'S BLUSH. Large, beautiful blush cheek.

WINTER VARIETIES

BALDWIN Large, dark red; productive.
BANANA. Large, golden yellow, shaded crimson.
ENSEE. Bright red in color and a splendid keeper.
GRIMES GOLDEN. Medium to large, skin golden yellow, flesh crisp, tender, juicy; long keeper.
JONATHAN. Medium, red and yellow, flesh tender, juicy.
NORTHERN SPY. Large, striped red; good keeper.
ROME BEAUTY. Large, yellow, shaded red, tender.

WINTER VARIETIES (Continued)

STAYMAN'S WINESAP. Fruit medium size, mostly covered with red on a yellow ground; flesh fine, crisp, juicy.

WINESAP. WINESAP. Medium, deep red, rich, sub-acid.
YORK IMPERIAL. Medium, yellow, shaded red, firm, juicy, sub-acid; an excellent shipping apple.

ONE YEAR OLD APPLE TREES Of the Above Varieties

3 to 4 feet high, 35c each; \$3.50 per dozen; 25 for \$7.00; 50 for \$13.00; 100 for \$25.00.

CRAB APPLES

5 to 7 feet high. 90c each; \$9.00 per dozen. HYSLOP. Deep crimson; very popular on account of its large size, beauty and hardiness. TRANSCENDENT. Skin yellow, striped with red.

QUINCES

3 to 5 feet high. \$1.00 each; \$10.50 per dozen. APPLE OR ORANGE. Large, bright golden yellow, fine quality; flesh firm, cooks tender; October.

We do not guarantee or replace plants, shrubs or trees at prices quoted.

FRUIT TREES, GRAPE VINES AND SMALL FRUITS—Continued

CHERRIES

HEART AND BIGARREAU (Sweet)

4 to 6 feet, first-class. \$1.00 each; \$10.00 per dozen.

BLACK TARTARIAN. Very large, purplish-black, juicy rich, excellent, productive; last of June.
GOVERNOOD. Large, light red, juicy, rich, delicious; tree healthy and productive; June.
YELLOW SPANISH. Large, pale yellow with light red cheek; late June

cheek; late June.

DUKE AND MORELLO (Sour)

4 to 6 feet, first-class. \$1.00 each; \$10.00 per dozen.

DYEHOUSE. A very early and sure bearer; ripens a week before Early Richmond; fine quality; June.

EARLY RICHMOND. Medium, dark red, fine quality.

ENGLISH MORELLO. Dark red, rich, acid, juicy, and good. Late July.

PEACHES

4 to 5 feet. 60c each; \$6.00 per dozen.

CHAMPION. Creamy white with red cheeks, freestone, excellent quality; early in August.
CRAWFORD'S EARLY. Large, yellow, of good quality, freestone; early in September.
CRAWFORD'S LATE. Large, yellow with red cheeks, freestone; last of September.
ELBERTA. Large, yellow with red cheek, flesh yellow, firm, juicy, of high quality; very prolific; September.
HEATH CLING. Large, flesh white, juicy and melting; October.

J. H. HALE. Deep golden yellow overlaid with bright carmine. Large size and productive.

OLD MIXON FREE, Large, yellow with red cheek;

September.

PEARS—STANDARD

5 to 7 feet, first-class. \$1.25 each; \$12.50 per dozen.

BARTLETT. Large, clear yellow, juicy. August.
FLEMISH BEAUTY. Fruit is large, skin pale yellow, flavor sweet and melting; September and October.
KIEFER'S HYBRID. Large, rich color and good quality.
SECKEL. Small, yellowish brown; one of the best.

PLUMS STANDARD ON PLUM STOCKS

5 to 7 feet. 90c each; \$9.00 per dozen.

ABUNDANCE. Large, yellow with heavy bloom, good quality; very prolific.

BURBANK. The largest and best variety; color red; excellent quality; hardy and vigorous grower.

BED JUNE. Large, red. fine quality; strong, vigorous grower: finest extra early plum.

SHIPPER'S PRIDE. Large, purple, fine, juicy and sweet. YELLOW EGG. A beautiful yellow, egg-shaped plum of large size, flesh yellow; late August.

BLACKBERRIES

\$1.00 per dozen; \$6.00 per 100.

The Blackberry is one of the most profitable fruits to grow when properly managed, as it thrives well in almost any soil, but reaches perfection in a strong loam tending towards clay.

Ancient Briton. Large fruit, stems loaded with good sized berries of fine quality; vigorous grower, one of

sized berries of fine quality; vigorous grower, one of the best.

Eldorado. Large fruit, borne in large clusters and ripen well together, fine quality; good keeper.

Mersereau. Extremely hardy, berries large, extra qual-ity, sweet, rich and melting without core; good keeper and shipper; vigorous grower.

Taylor. Medium-sized fruit of fine flavor, extremely hardy and very productive; ripens late.

CURRANTS

Two-Year-Old Plants

A cool, moist soil is best adapted to the growth of Currants. Strong, moist loams with a considerable mixture of clay, are good. Even well-drained, stiff clay will give good results.

dozen.

DEWBERRY

ucretia. One of the low-growing, trailing blackberries. It has proved highly satisfactory wherever tried, and many say it is the best of all the blackberry family. \$1.00 per dozen; \$6.00 per 100. Lucretia.

GOOSEBERRIES Two-Year-Old Plants

The best results are obtained by planting in moist, but not soggy, clay loam, but they will do reasonably well in any well drained soil if they are well fertilized once each

year.

Downing. Large, pale green, and of splendid quality for both cooking and table use. 30c each; \$3.00 per dozen.

Houghton's. Small to medium: roundish, oval, pale red, sweet, tender. 25c each; \$2.50 per dozen.

Industry. Berries of largest size, excellent flavor, pleasant and rich, dark red color when fully ripe; strong upright grower; an immense cropper. 25c each; \$2.50 per dozen.

Smith's Improved. Large, pale, greenish yellow, skin thin, of excellent quality. 25c each; \$2.50 per dozen.

GRAPE VINES

ALL TWO-YEAR-OLD SELECTED STOCK Grape vines will grow almost anywhere, but they should be carefully cultivated and pruned.

BLACK OR PURPLE GRAPES

*Concord. Large, black grape, hardy and productive; juicy and sweet. 15c each; \$1.50 per dozen.

Ives' Seedling. Dark purple, sweet. 20c each; \$2.00

per dozen.

Moore's Early. oore's Early. Ripens ten days earlier than Concord; bunch and berry round and large. 20c each; \$2.00 per

RED GRAPES

*Catawba. Berries large, round; when ripe a dark copper color, sweet, rich. 30c each; \$3.00 per dozen.

Delaware. Small, light red, thin skin; very juicy, sweet, sprightly. 30c each; \$3.00 per dozen.

WHITE OR YELLOW GRAPES

*Niagara. Bunch and berries large, light greenish white, slightly ambered. 20c each; \$2.00 per dozen.

Pocklington. Bunch and berry very large; attractive, golden yellow color. 25c each; \$2.50 per dozen.

Varieties marked with a * are best for arbors.

RASPBERRIES

They will do well in any good soil, but thrive best in deep, moist (not over wet) soil. The lighter loams are preferable for the red varieties. while the heavier loams suit the black varieties best.

The following varieties are all 75c per dozen, \$4.50

per 100.

Gardinal. Produces a fine quality of dark red or almost purple berries through a long season.

Cumberland. The largest black cap; a healthy, vigorous grower; very productive.

Cuthbert. Large, firm, deep rich crimson, of excellent quality, tall, strong and vigorous.

St. Regis. The berries are a bright crimson, of large size and surpassing quality—rich, sugary with full raspberry flavor flavor.

STRAWBERRIES

Strawberries will do well in any soil that will grow good corn. Soil should be made fine and loose. A generous supply of well rotted manure incorporated in the soil is of great benefit.

EVER-BEARING STRAWBERRY

Iastodon. Has no equal as to quality, productiveness, and hardiness of plants. Quality of the fruit is of the very best. Size much larger than any other fall-bearing variety.
60c per dozen; \$2.50 per 100. Mastodon.

The following varieties are all 50c per dozen: \$1.25 per 100.

Aroma. One of the finest for long-distance shipping. The large berries are bright red to the center, of conical shape with prominent and attractive yellow seeds. Gandy. One of the best late varieties. Berries large, of fine form and excellent quality. Glen Mary. Large to very large, sometimes flattened; sweet, rich, delightful. Senator Dunlap. Exceedingly vigorous. Fruit large, regular and attractive in form, deep red to the center; firm in substance.

firm in substance.

SUITABLE DISTANCES FOR PLANTING SMALL FRUITS AND GRAPE VINES

Blackberries, 5 to 7 feet. Currants, 3 to 4 feet.

Raspberries, black, 4 to 5 feet. Strawberries, 1½x3½ feet.

Gooseberries, 3 to 4 feet.

Strawberries, in beds, 1½x1½ feet. Grapes, 8 to 10 feet.

We do not guarantee or replace Plants, Shrubs or Trees at prices quoted.

TREES, SHADE AND ORNAMENTAL

FOR LAWN, STREET AND FOREST PLANTING

- ASH. American white. A handsome, hardy, broadheaded tree. 8 to 10 feet. \$1.50 each; \$15.00 per dozen.
- CATALPA SPECIOSA. A handsome, rapid growing tree. 8 to 10 feet. \$2.00 each; \$20.00 per dozen.
- CATALPA BUNGEI. (Umbrella Catalpa.) 6 to 7 feet. 1 year heads. \$2.00 each; 2 year heads, \$3.00 each.
- LM. American. A hardy, rapid grower; resists drought and is long lived. 6 to 8 feet. \$1.50 each; \$15.00
- LINDEN. European. This is probably the largest leaved Linden. 6 to 8 feet. \$3.00 each; \$30.00 per dozen.
- IAPLE. Norway. A large, handsome tree with a compact rounded head of spreading branches. 8 to 10 feet. \$4.00 each; \$40.00 per dozen.
- MAPLE. Rock or Sugar. An excellent shade tree of upright, dense growth. Grows to a large size and is long lived. 8 to 10 feet. \$3.00 each; \$30.00 per dozen.
- APLE. Silver or Soft. Has wide, slender, spreading branches and thrives almost anywhere. 8 to 10 feet. \$2.00 each; \$20.00 per dozen. 10 to 12 feet. \$2.25 each; \$22.50 per dozen.
- IOUNTAIN ASH. European. A hardy tree; head dense and regular, beautiful fern-like foliage; covered from July till winter with clusters of bright red berries. 6 to 8 feet. \$3.00 each; \$30.00 per dozen. MOUNTAIN ASH.

- OAK. Red. A tree of rapid growth, growing into a large, majestic tree, the foliage turning dark red in fall. 4 to 6 feet. \$2.25 each; \$22.50 per dozen.
- **OAK.** Scarlet. A noble tree with spreading branches; leaves turn scarlet in fall. 6 to 8 feet. \$3.00 each; \$30.00 per dozen.
- OAK. Pin. Tree is fibrous rooted, transplants well and grows rapidly. Foliage turns bright red in fall. 6 to 8 feet. \$2.25 each; \$22.50 per dozen.
- **EACH.** Flowering, Red and White. At its blooming time in May every twig and branch is bright with beautiful formed flowers. 3 to 4 feet. **75c** each; **\$7.50** per dozen.
- OPLAR. Carolina. One of the surest and most rapid growing trees. 8 to 10 feet. \$1.50 each; \$15.00 per dozen. POPLAR.
- POPLAR. Lombardy. With age this tree becomes picturesque. 8 to 10 feet. \$1.25 each; \$12.50 per dozen. \$1.50 each; \$15.00 per dozen. 10 to 12 feet.
- SYCAMORE. Plantanus Orientalis. (Oriental Plane.) Very hardy and does well in moist places. Thrives in smoky cities, making it a good tree for city planting. 6 to 8 feet. \$1.50 each; \$15.00 per dozen.
- ULIP TREE. (Liriodendron Tulipfera.) Tall, hardy tree of pyramidal habit and rapid growth. Bears flowers of a creamy-yellow and oragne color in June. 6 to 8 feet. \$2.25 each; \$22.50 per dozen.

WATER LILIES

NOTHING equals a water lily pool for giving interest and distinction to the garden.

A natural pond is not required, in fact an artificial one is better, as it can be better kept to the same level. And a natural pond is likely to be fed by a cold spring which is injurious to many of the water lily plants.

The artificial pond is nothing more or The artificial pond is nothing more or less than an open tank with cement sides and bottom; any man who works in cement will know how to do this. It should be about two feet deep, and a drain opening should be provided to empty the pond when it is necessary and a faucet to fill it, or this may be done by a hose.

Make the pond as large as possible; don't be afraid of its being too big. The shape depends entirely upon its location and the surroundings; a round pond may seem to be most in keeping with the garden scheme. or a square, or an irregular pool may seem

It should have full sunlight; a water lily pond under the shade of trees will be a disappointment if you want the plants to bloom. Plant the water lilies in boxes or tubs, they will do better and can be better handled. A box two feet square, or diameter, is as small as you can have for the plants to do well; this should be about ten inches deep, but a larger box is better.

The soil should be a heavy loam, or a clay will do, mixed with one-third to even one-half well-rotted cow manure and

a little bone meal.

There is such a variety of hardy water lilies now that one may have nearly all the shades of color in them alone, and they do not require moving for several years after being planted. The only condition is that they do not freeze to the roots. Reserve some corners of the pond, or have one or two additions for the Lotus (Nelumbium). It is one of the showjest and most satisfactory of the water plants. It must be confined or it will spread, and root out the water lilies. It requires the same soil, but six inches of water above the soil is sufficient. The roots will penetrate and lie close to the bottom. This also is hardy, provided the roots do not freeze. Do not empty the pond in winter. If it is necessary to clean it out, do it in the spring before the roots have started to grow.

Goldfish are an essential adjunct of the lily pond, both as an ornament and to eat up some of the insect life. People will ask, what do you do with them in winter time? Do nothing. If the pond does not freeze to the bottom they will take care of themselves and go to sleep in the mud; they can not be seen, but a few warm sunshiny days will bring them

into view again.

 $H\ A\ R\ D\ Y\quad N\ Y\ M\ P\ H\ A\ E\ A\ S\ (\texttt{Day\ Blooming})$ ODORATA. This is the fragrant Pond Lily of the United States; flowers white, 3 to 5 inches in diameter, stamens yellow, leaves dark green above, under surface deep red to reddish green; splendidly adapted for planting in quantity in natural ponds. 30c each; \$3.00 per dozen.

TUBEROSA ROSEA. Flowers an exquisite shade of pink, standing above the water. A good vigorous grower, without being rank; a free bloomer.

75c each; \$7.50 per dozen.

- TUBEROSA RICHARDSONI. Flowers pure white and quite double, the stamens being converted into petals which are more or less fluted in the centre. The flowers stand well above the water, the sepals and outer petals drooping, forming immense snowball-like flowers, 8 inches in diameter. 75c each; \$7.50 per dozen.
- MARLIACEA ROSEA. Flowers large, deep rose color, young leaves purplish-red, changing to deep green. A free and continuous bloomer.

\$1.25 each; \$12.50 per dozen.

Water Lily Roots should be sent via express; if wanted by mail at purchaser's risk, remit 5c each, or 30c per dozen. Climbing Plants should go via express; if wanted by parcel post, add 5c each, or 30c per dozen, for postage. Ready for delivery about the middle of May, weather permitting.

McCullough's SELECTED FLOWER SEEDS

Every year we carefully revise our list of flower seeds, add a number of new sorts and discard all inferior varieties. Our collection will be found to contain everything really desirable. Our stock of seeds is of the highest possible quality.

YOU will notice that all of our descriptions of flowers are classified as "annual," "hardy annual," "tender annual," "perennial," "biennial," etc.; these descriptions, when properly understood, will tell much about planting.

during April, or earlier indoors for transplanting outside. Hardy annuals may also be sown in the fall for earlier spring blooming. ANNUALS attain full growth from seed, bloom and die in one season.

HALF HARDY and TENDER ANNUALS should be sown in the house or hot-bed and not be sown or transplanted outside until the weather is settled and warm.

BIENNIALS are plants that bloom the second year from seed, and then die. Many of these will bloom the first year if sown early. Sow under same conditions as perennials.

PERENNIALS are plants that bloom the second year from seed and the plant lives and blooms for many years. If sown in early spring, many perennials will bloom the first year from seed. Tender and half-hardy perennials are best sown in spring after frost is over. Hardy perennials may be sown in May or June and again in August or September for next year's flowers.

TENDER OR GREENHOUSE means the plant will not stand the least frost. All such must be planted late in spring, or in a greenhouse.

HARD SHELLED SEED, like Canna, and Japanese Morning Glory, Moon Vine, etc., should be soaked in warm water 36 hours before planting.

How To sow flower seeds: A common mistake in sowing flower, as well as other seeds, is covering too deeply. The exception to this is the Sweet Pea, which is seldom planted deep enough. As a general rule, cover small seeds only to the depth of the thickness of the seeds; or, with medium-sized seeds, like Balsam, Zinnias, etc., half an inch or so is none too much. Such fine seeds as Petunias, Portulacas, etc. need only to be pressed into the soil with a piece of board. Always press the earth after sowing all flower seeds, because there is danger of their drying up before the roots can get firm hold of the soil. Seeds of the hardier annuals may be sown where they are to grow; but, as a rule, it is preferable to transplant, as the plants are generally stronger and stand the drought better. During very dry weather, and when the seedlings are first set out, they should be watered frequently. Provide some support for all such plants as require it.

The weeds should be kept down and the ground loosened often, so that the plants will receive the full benefit of the rains and dews, which they will not if the ground is allowed to become hard and baked.

ABUTILON (Flowering Maple)

E LEGANT flowering plants of strong and easy cultivation, producing various colored, drooping bell-shaped flowers. Sown indoors any time before April, they will produce plants that will flower outdoors the first season and indoors all winter. Half-hardy Perennial.

—Fine Mixed. Of choice varieties and colors...10c pkt.

ACROCLINIUM

—Double Mixed. An "Everlasting," growing about 15 inches high, bearing white or rosy pink flowers, which, when cut in the bud state, can be dried and used in winter bouquets. Half-hardy Annual.

1/4 oz., 20c; 10c pkt.



ADLUMIA

(Mountain Fringe, Allegheny Vine, or Climbing Fumitory)

A graceful climber, but, as it resows itself year after year, it might be considered perennial. The feathery foliage closely resembles that of the Maidenhair Fern. The flowers are tube-shaped, flesh-colored, and completely cover the plant. For covering trellises, stumps of trees, etc., it is very desirable. Flowers the first year from seed. Hardy Biennial.......10c pkt.

AGERATUM (Floss Flower)

NE of the very best bedding plants, being literally a sheet of bloom from early summer till frost. Unlike many bedding plants, their flowers are not liable to be spoiled by rain, nor do the colors fade out. The blue varieties are without doubt the most satisfactory bedding plants of this color for our trying climate. Easily raised from seed, which is usually started in a hot-bed or window and transferred to the open ground in May. Can also be sown outdoors in May. Half-hardy Annual.

4-Blue Perfection. This is the darkest colored of all large flowering Ageratums. Color, deep amethyst-blue; compact growth; fine bedder. (See cut).....¼ oz., 50c; 10c pkt.

5-Blue Star. Of dwarf and even growth; the tiny bushes, not over 4 to 5 inches high, are densely covered with bright blue flowers; a fine variety for edging. . 3 pkts., 25c; 10c pkt.

AGROSTEMMA

(Rose of Heaven, Mullein Pink)

A N attractive, free-flowering plant of easy culture, producing flowers on long, slender stems like a single pink. Blooms the first season. Fine for cutting; 1 to 2 feet. Hardy Perennial.

-Mixed Varieties......10c pkt.

ALLEGHENY VINE. (See Adlumia.)

All 10c Packets of Flower Seeds are 3 Packets for 25c. 13 Packets for \$1.00.

ALYSSUM (Mad-Wort)

- PRETTY little plants for beds, vases, baskets, edgings or rockwork, blooming profusely all summer; useful also for winter-flowering. Hardy Annual.
- Little Gem, or Carpet of Snow. We know of no other flower which is so particularly well adapted for borders, ribbons, etc. The plants commence to bloom when quite small, and will flower all summer until late in the fall. This habit, with its fragrance, makes it indispensable. Keep the seed pods sheared off the plants and they will bloom until killed by frost. Sow the seeds wherever the plants are to remain. If too thick, thin out. To prevent sowing too thickly, mix the seed with sand before sowing. (See cut.) -Little Gem, or Carpet of Snow.

-Lilac Queen. Is of dwarf, compact habit and the deep, lavender flowers are borne in profusion. 10c pkt.

Sweet Alyssum. Of trailing habit; flowers white. The popular old-fashioned sort, the best for broad edges and vases. It begins to bloom early in the season, and blooms until frost. It is a neat, thrifty, healthy grower and should be cultivated by everyone who wants an all around good plant.

1/4 oz., 15c; oz., 30c; 10c pkt.

-Saxatile Compactum. (Basket of Gold.) Showy, bright yellow flowers, excellent for rockwork and edge or border. Hardy Perennial. 1 foot.......10c Pkt.

AMMOBIUM

One of the hardiest of everlastings, valuable for forming winter bouquets, in connection with grasses and other everlastings. The flowers should be gathered before fully opened. 2 feet. Hardy Annual.

11-Alatum Grandiflorum. White, large flower. 10c pkt.

AMPELOPSIS

-Veitchi. (Boston or Japanese Ivy.) A Hardy Peren-nial climber from Japan. The best and most popular climber for covering brick or stone walls. ¼ oz., 15c; oz., 50c; 10c pkt. 12-Veitchi.

ARABIS (Rock Cress)

-Alpina. Early Spring flowering plant, especially adapted for edging and rockery; plants form a dense carpet completely covered with pure white blossoms in May. 6 inches. Hardy Perennial........10c Pkt. -Alpina.

ARCTOTIS (African Daisy)

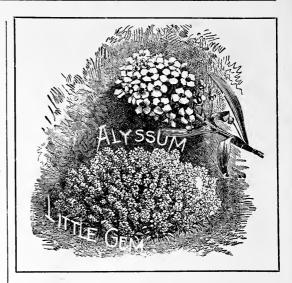
Grandis. Forms much-branched bushes 2 to 6 level high; its flowers are large and showy, being pure white on the upper surface, the reverse of petals pale lilac-blue; blooms early in July and continues until hard frost. It delights in a sunny situation.

Half-hardy Annual.

24 oz., 30c; 10c pkt.



Antirrhinum



ANTIRRHINUM

A NTIRRHINUMS or Snapdragons are one of the best cut flowers which can readily be grown from seed. They succeed best in a rather light soil, in a sunny position. For early flowering, sow in fall, protecting the plants with a covering of leaves through the winter. Sown in spring, they bloom by mid-summer, and if the flowers are cut freely the flowering is continuous till fall. If intended for winter flowering in the house, cut them well back in September. The Snapdragon, like most perennials and biennials which bloom the first year, is treated like an annual and sown every year. Half-hardy Perennial. (See

TALL, GIANT FLOWERING

Flowers nearly double the size of the older sorts.

15—Apple Blossom. Rosy pink, with white tube. 10c pkt. 16—Copper King. Velvety copper scarlet.....10c pkt. 17-Diamond. Carmine scarlet, lilac tube.....10c pkt. 18-Old Gold. Deep golden yellow.....10c pkt. 19—Snowflake. Pure white with yellow tube....10c pkt.
20—The Rose. Rose pink...................10c pkt. -Special Collection. One packet each of the above 6 varieties..... 50c. Tall Giant Mixed. A splendid mixture, containing all the colors, magnificent, large individual flowers.

½ oz., 30c; oz., \$1.00; 10c pkt.

SEMI-DWARF GIANT FLOWERING

Are particularly good for bedding, as they require no staking. The flowers are most wonderful, in many new shades and tints.

 24—Gloria. Rich deep rose pink.
 10c pkt.

 25—Golden Queen. Pure yellow.
 10c pkt.

 26-Grenadier. Orange scarlet, white tube......10c pkt. 28-Silver Pink. Pearly pink, self colored...........10c pkt. 29-Special Collection. One packet each of the above 6

ASPARAGUS

-Plumosus Nanus. (Asparagus Fern.) This graceful climbing Asparagus has fine foliage, and will last for weeks after being cut. It is an excellent house plant. Greenhouse Perennial.

Sprengeri. (Emerald Feather.) One of the best plants to grow in baskets, for greenhouse or for outdoors in the summer. The fronds frequently grow 4 feet long, and are now considered indispensable in all fine decorations; grows readily from seed. 32-Sprengeri. Greenhouse Perennial.....

All 10c Packets of Flower Seeds are 3 Packets for 25c. 13 Packets for \$1.00.

ASTERS

A STERS are one of the most important summer and autumn flowers, and receive special care at our hands. Our list comprises only such sorts as can be planted with perfect confidence that nothing better is procurable, no matter at what price or from what source.

The early sorts begin blooming in July, followed by the mid-season kinds, which flower during August; then the lateflowering varieties, which are at their best through September.

It is quite easy, therefore, with a little care in the selection of the varieties, to have Asters in flower from the first days in July until hard frost.

Asters will thrive in any good soil, prepared in the same way as you would for a crop of vegetables, but it is well to remember that any extra care taken in the preparation of the soil is repaid by finer plants, larger blooms, with longer stems and more profuse flowering. They should have an open, sunny position, and prefer a good, heavy loamy soil, enriched with a liberal quantity of thoroughly rotted manure, and the addition of wood ashes or air-slaked lime, and we do not advise growing them on the same ground two years in succession

Sow either in the open ground in May, or in March or April sow in cold frame, spent hotbed, or pots or boxes in the house, covering the seed with about one-fourth inch of good soil. When the plants are strong enough transplant about 18 inches apart in deeply dug well-prepared beds. Half-hardy Annual.



34—McCullough's "Premier" Mixture

This is the finest mixture of Asters in existence, and the most critical lovers of this flowe will be astonished at the wide range of colors and varieties given in this strain. 1/8 oz., 40c; 1/4 oz., 75c; 10c pkt.

Giant Branching Asters
This superb strain is of American origin and is especially adapted to our

origin and is especially adapted to our climatic conditions.

The plants form strong, branching bushes, 2 to 2½ feet high, bearing olong, strong stems their handsome Chrysanthemum-like flowers, which under ordinary cultivation, average 4 inches across. The form of the flowers, inches across. The form of the flowers, together with the length of the stems, places them at the head of Asters for cutting. They come into bloom from two to three weeks after the average type, usually being at their best during Soutember. ing September.

35-Crimson10c pkt.
36-Lavender10c pkt.
37-Deep Purple10c pkt.
38-Rose
39-Shell Pink10c pkt.
40-Pure White 10c pkt.
41-Collection. One pkt. each of the
above 6 varieties
42-Finest Mixed. Containing many
more colors than mentioned above.
½ oz., 25c; ½ oz., 40c; 10c pkt.

Improved Giant Comet Asters

The finest type of the Giant Comet, or Ostrich Feather Asters. Much larger than the Giant Comet, the petals longer, more curled and twister produced in greater abundance. more curled and twisted Borne

43—Crimson10c pkt.
44-Rose 10c pkt.
45-Light Blue 10c pkt.
46-Dark Blue 10c pkt.
47—Pink10c pkt.
48White
49-Collection. One pkt. each of the
above 6 varieties50c.
50-Finest Mixed. All colors.
10c nkt

Royal Asters

(The Early Branching Aster)

The flowers are large and firm; the stems long and stiff and the colors are decided and pleasing. The plants grow about 24 inches high and come into bloom about 10 days before the Giant Branching Aster.

King Asters

The habit is similar to the popular Giant Branching, vigorous in growth, long stiff stems. In form the flower is entirely distinct from any other variety; petals somewhat resemble the quilled varieties, but are much larger and broader, those in the center being curled and incurved, completely covering the crown. In shape and size the bloom is round, full and very large.

58—Crimson10	c pkt
59-Rose10	0c pkt
60—Violet	Oc pkt
61-Lavender10	0c pkt
62-Pink10	0c pkt
63-White10	0c pkt
64-Collection. One pkt. each	of the
above 6 varieties	50с
65-Finest Mixed	c pkt.

Queen of the Market Asters

A first-class early flowering Aster, coming into flower in July, of branching habit; flowers of good size and borne on long stems, making them exceedingly valuable for cutting; one

66 -Rose
67—Crimson10c pkt.
68-Light Blue 10c pkt.
69-Dark Blue10c pkt.
70-Pink 10c pkt.
71-White10c pkt.
72-Collection. One pkt. each of the
above 6 varieties50c.
73-Finest Mixed. All colors.
1/4 oz., 35c: 10c pkt.

Express Extra Early Asters

Early flowering Asters of great merit, not only for garden purposes, but of even more value for early cut flowers; come into bloom in the open ground with us by the middle of July. They are the largest early Asters of which we know, flower 3 1/2 to 4 inches across, of double Comet type; splendid substance and long stems; plants healthy and sturdy, branching habit; 18 inches high; free bloomers.

74—Dark Blue10c pkt.
75-Light Blue 10c pkt.
76-Rose 10c pkt.
77-White10c pkt.
78—Collection. One pkt. each of the
above 4 varieties35c.
79—Finest Mixed. All colors.
½ oz., 30c; 10c pkt.

Beauty Asters

These late-flowering Asters are of recent introduction and are a valuable addition. Plants grow two to three feet high, of branching habit, commencing to bloom in September and lasting until destroyed by frost.

The large and perfectly double flowers are borne on long, stout stems. Splendid cut-flower variety.

80—Azure Fairy. 10c pkt. 83—Pink. 10c pkt. 10c pkt

The image and periodicy	double no week the borne on the
80-Azure Fairy10c pkt.	83-Pink10c pkt.
81—Carmine Rose. 10c pkt.	84-Purple10c pkt.
82-Crimson10c pkt.	
	t each of the above six vari-
ties	

AQUILEGIA, OR COLUMBINE

CHARMING hardy plants, bearing in countless numbers through May and June exquisite clear blue, white, rose, yellow, purple and striped blossoms. For planting in permanent borders or edges of shrubbery this old-fashioned favorite is one of the best. They thrive well with ordinary garden culture, but do best in partially shaded nooks. Few hardy plants are so easily grown from seed. Will bloom first season if sown very early. Hardy Bigming! Biennial.

beautiful strain, comprising Α

BALLOON VINE

(Cardiospermum) (Love-in-a-Puff)

BACHELOR'S BUTTON, BLUE-BOTTLE OR RAGGED SAILOR. (See Cyanus.)

BLACK-EYED SUSAN. (See Thunbergia.)

BALSAM

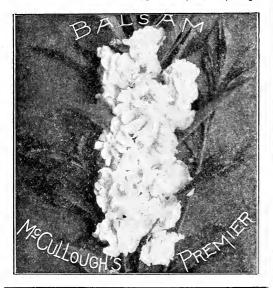
(Lady Slipper, or Touch-Me-Not)

ONE of the oldest and best-known summer-blooming annuals, of easy culture. Desirable for garden or pot culture. The soil should be of the richest and best quality. Set about 15 inches apart, and give them plenty of manure water. Tender Annual; two feet.

-Salmon Pink. Brilliant salmon-rose flowers; very double, of finest camelia flowered type.....10c pkt. -White Perfection. The finest pure white grown; flowers unusually large, solid and double.....10c pkt.

-Scarlet. Brilliant flery scarlet......10c pkt.

99— McCullough's



Nature constantly asks the question, which do you prefer, flowers or weeds-ugliness or beauty?



BALSAM, Apple or Pear

VERY curious climbing vine, with ornamental foliage, fruit golden yellow, warted, and when ripe opens, showing the seed and its brilliant carmine interior. Ten feet. Tender Annual.

BEGONIAS

Ever-blooming Bedding Varieties

THE following are varieties of Begonia Semperflorens, doing equally well in full sunlight, or in positions partially or wholly in shade. They grow about one foot high and form dense bushes, which, from May until frost are completely hidden with flowers. As pot plants for winter flowering they are superb. Easily raised from seed, which should be started indoors or in a hot-bed. Tender Perennials.

—Gracilis Luminosa. This differs from Begonia Gracilis in the lustrous reddish-brown color of the foliage, while the flowers measuring 1 to 1½ inches across, are of a fiery dark scarlet. It is very free flowering, and where massed produces a splendid effect. 10c pkt.

—Semperflorens, Bertha Bofinger. Grows only 6 inches high and is one of the dwarfest varieties of Bedding Begonias. The flowers are carmine-rose, and

-Semperflorens, Single Mixed. This mixture contains all the best varieties, ranging in color from pure white to the deepest crimson; splendid......10c pkt.

TUBEROUS-ROOTED BEGONIAS. (See Bulbs.)

BELLIS (English Daisy)

A FAVORITE perennial plant, which will stand the winter if given the protection of a few leaves or litter; in bloom from early spring until well on in the summer. The seed we offer is saved from the finest double varieties; easily raised from seed; usually sown in August, but can be sown in spring, and for best results should be sown each year; 4 inches. Half-hardy Perennial.

-Longfellow. Large, double, dark pink flowers, with long, stiff stems......10c pkt.

107—Snowball. A beautiful white variety with long stems and very double flowers; fine for cutting.....10c pkt.

-Giant Double. Beautifully and densely imbricated flowers, 1 ½-inches in diameter. Finest mixed..10c pkt.

CALCEOLARIA

CALENDULA (Pot Marigold)

SHOWY free-flowering hardy annuals, growing in any good garden soil, producing a fine effect in beds or mixed borders, continuing in bloom from early summer until killed by frost; valuable also for pot culture; one foot. Hardy Annual. (See cut.)

110—Ball's Strain. A fine double variety of large size. Same color as Orange King and resembles it closely in all other respects. Largely grown by florists for winter blooming in greenhouses and also is excellent for the garden.

'4 oz., 50c; 10c pkt.

114-Fine Double Mixed. Contains the choicest sorts.

½ oz., 15c; 10c pkt.

Calliopsis

(See also Marigold.)

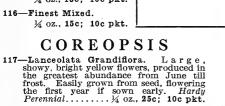
CALLIOPSIS

S HOWY and beautiful free-flowering annuals, of the easiest culture, doing well in any sunny position, blooming all summer and excellent for cutting and massing. It is best to sow them where they are to bloom, thinning out to stand 8 inches to 12 inches apart. By keeping the old flowers cut off the flowering season can be lengthened until late autumn. Hardy Annual. (See cut.) (See cut.)

115—Golden Wave. Bright, golden yellow flowers, with small, dark cen-ters, blooming profusely.

1/4 oz., 15c; 10c pkt.

116-Finest Mixed.



CAMPANULA

(Canterbury Bells)

THIS old-fashioned flower is a favorite with all. Stately and showy, and of the easiest culture. The seeds should be sown about April, in finely prepared, rich soil. Hardy Bien-

Calycanthema. (Cup and Saucer Canterbury Bells.) They differ from the ordinary type in having an extra large calyx, which is of the same color as the flower, giving the appearance of a cup and saucer.

118—Pink. Delicate rosy-pink......10c pkt.
119—Blue. A fine, clear shade......10c pkt. 120-White. Pure white......10c pkt.

Medium. (Single Canterbury Bells.) The old fashioned sort, with beautiful large bell-shaped blossoms. (See cut.)

122—Single Mixed. All colors.

1/4 oz., 25c; 10c pkt. 123-Double Mixed. All the double-flowering medium varieties..... ¼ oz., 40c; 10c pkt.



CANARY-BIRD VINE

(Tropacolum Canariense)

124—A beautiful rapid annual climber, the charming little canary-colored blossoms bearing a fancied resemblance to a bird with its wings expanded. Half-hardy Annual. 1/4 oz., 20c; 10c pkt.

CANDYTUFT

PERENNIAL CANDYTUFT. (See Iberis.)



CANNA (Indian Shot)

SOAK the seeds in warm water until they show evidence of swelling; then sow in sandy loam, and place in a hot-bed; when up to the second leaf, pot off singly. Half-hardy Perennial. Perennial.

130-Mixed. Crozy's finest sorts 1/4 oz., 15c; 10c pkt.

CARDINAL CLIMBER

(Ipomoea Quamoclit Hybrida)

31—The most brilliant, beautiful and distinct annual climber intro-duced for many years. Rapid grower with Rapid grower with branching habit; flowers all summer; cardinal red clusters, 15 to 25 feet. Tender Annual.....10c pkt.

Cardinal Climber Plants. Each, 30c; by mail, each, 35c.

All 10c Packets of Flower Seeds are 3 Packets for 25c. 13 Packets for \$1.00.

CARNATION

CELOSIA, or Cockscomb

GRACEFUL plants, growing best in rather light soil, not too rich, producing beautiful comb-shaped flowers; grown in pots, they are fine for the greenhouse or conservatory. Half-hardy Annual 133-Glasgow Prize.

Enormous rich, deep crimson combs.
10c pkt. 134-Dwarf Mixed. Large solid heads of bloom....10c pkt.

Celosia Plumosa (Feathered Cockscomb)

Make fine plants for large beds or groups, and the plumes or flowers can be cut and dried for winter bouquets.

135—Thompsoni Magnifica Crimson. Of pryamidal growth, attaining a height of 3 feet and producing graceful, feathery plumes of the most brilliant crimson.

10c pkt.

136—Thompsoni Magnifica Yellow.

10c pkt.

137—Plumosa, Mixed.

CHILDSI. (See Chinese Woolflower.)

CENTAUREAS

NDER this name is included such popular annuals as U the Cornflowers, Sweet Sultans, etc. They are perfectly hardy, will grow almost anywhere, and are in demand as cut flowers.

Cornflowers (Centaurea Cyanus)

These are also known as Bachelor's Button, Blue Bottle, Ragged Sailor and Bluet. Attractive flowers of easiest culture. Sow early in spring in the beds where they are to bloom. Hardy Annual. (See cut.)

138—Dwarf Blue. Single blue.

½ 0z., 15c; 0z., 25c; 10c pkt.

140—Double Blue. Flowers semi-double. 10c pkt.

141—Double Pink. 20c., 15c; 0z., 25c; 10c pkt.

Royal Sweet Sultans (Centaurea Imperialis)

The beautiful sweet-scented, artistic-shaped flowers are borne on long, strong stems, and when cut will stand for several days in good condition. It is best to sow very early in the spring.

Hardy Annual. 146-Purple.....10c pkt. 147-White.....10c pkt.

149—Finest Mixed Colors...... 1/4 oz., 20c; 10c pkt. Vhite-Leaved Centaureas (Dusty Millers)

Fine for bedding, vases, hanging-baskets and pots; also extensively used for borders. Sow the seed early indoors and transplant in May. Tender Perennial.

150—Gymnocarpa. Fine-cut silvery foliage; the kind used most for borders; 1 foot...... ½ oz., 20c; 10c pkt.



CENTROSEMA (The Butterfly Pea)

151—Grandiflora. Interesting and beautiful vine of rare and exquisite beauty. It blooms early in June from seed sown in April, and bears in the greatest profusion inverted pea-shaped flowers, from 1½ to 2½ inches in diameter, ranging in color from a rosy violet to a reddish purple. Hardy Perennial.......10c pkt.

CHINESE WOOLFLOWER

(Celosia Childsi)

CHRYSANTHEMUMS

Hardy Annual Varieties

The hardy annuals are summer-flowering border plants and quite distinct from the hardy perennial varieties.
153—Annual Double Mixed. Yellow, white, etc., 10c pkt.
154—Annual Single Mixed. (Painted Daisies)...10c pkt.



SHASTA DAISY

(Chrysanthemum Leucanthemum)

—Alaska. A splendid hardy perennial variety, with flowers rarely less than 4 inches across, of the purest glistening white, with broad, over-lapping petals, and borne on long, strong stems; a beautiful cut flower, remaining in good condition a week or more. (See cut.) 10c pkt.

CINERARIA

A WELL-KNOWN greenhouse plant, having a range and brightness of color scarcely surpassed. It may be had in bloom through the greater part of the year. Greenhouse or Tender Annual.

-Grandifiora Nana. Dwarf compact plants not over a foot high with immense heads of individual flowers in a great range of beautifu

All 10c Packets of Flower Seeds are 3 Packets for 25c. 13 Packets for \$1.00.

CLARKIA

A DESIRABLE free-growing plant, blooming in almost any soil, but when planted in rich loam its beauty is unsurpassed; will continue in bloom nearly all summer. Sow in April and May and thin out. Hardy Annual.

158—Elegans. Double Mixed10c pkt.

COLEUS

Large-Leaved Varieties. Our strain of hybrid varieties produces the finest colored, most attractive and novel foliage plants for house or garden culture. A most interesting subject to grow from seed. Sow indoors in March or April and transplant to open ground in May. Tender Perennial...... 2 pkts., 25c; 15c pkt.

COSMOS

BEAUTIFUL, autumn-blooming plants, they produce thousands of beautiful flowers in pure white, pink and crimson shades, furnishing an abundance of cut blooms for autumn decoration when other flowers are scarce. Should be sown in spring in the open ground, when danger of frost is past, or the seed may be started under cover and afterwards transplanted. Plant not less than 18 inches apart in rows or in masses in beds. When the plants are about a foot high the tops should be pinched out to induce a bushy growth. They prefer a rather light, not too rich soil, but do well almost any where. Half-hardy Annual. (See cut.)

Double Crested Cosmos

One of the best novelties of recent years. These varieties produce full, round, double flowers on sturdy, bushy plants, blooming in late summer and

160—Double Crimson	10c	pkt.
161—Double Pink	10c	pkt.
162-Snowball, pure white	10c	pkt.
163—Finest Mixed	10c	pkt.

Extra Early Mammoth Flowering

Seeds sown in the open ground produced plants that were covered with bloom two months before the late-flowering

164Crimson. Rich	¥∕	oz., 25c:	10c pkt.
165—Pink. A pretty shade	$\sqrt{2}$	oz., 25c:	10c pkt.
166-Pure White	1/4	OZ., 25c:	10c nkt
167-Mixed, Early Cosmos	í,	oz 20c:	10c pkt
	/4	02., 200,	IVU PEU.

Mammoth Perfection

magnificent selection, bearing flowers of mammoth

CYPRESS VINE (Ipomoea Quamoclit)

ELICATE, fern-like foliage, and masses of beautiful, small star-shaped flowers. Sow in May, first soaking the seeds in warm water for a few hours. 15 feet. Half-hardy Annual.

HINTS ON THE CULTURE OF FLOWERS FROM SEED

Much annoyance and disappointment may be saved by giving close attention to the following: Avoid especially deep planting; over-watering, under-watering, or sowing too thickly.



COBAEA SCANDENS (Cathedral Bells)

30c each; \$3.00 per dozen, (by mail, 35c each.)

CYCLAMEN

(Persicum Giganteum.) A poputer and spring-flowering. Seedlings 176-Giant-Flowered.

DAHLIA

DAHLIAS are easily grown from seed and bloom the first season. The earlier they are started the better, which can be done nicely in a box in a sunny window, or the greenhouse. Protect the roots during winter in a dry cellar in sand. Half-hardy Perennial.

Double Flowering

-Cactus Varieties. Most popular at the present time, distinct and elegant; petals pointed....10c pkt. -Double Large-Flowering. This mixture is composed of the finest large-flowering double varieties...10c pkt.

Single Flowering

See McCullough's Collection of

"Easy to Grow" Flower Seed. It may save you money. Illustrated on last page of cover.

DELPHINIUM (Hardy Perennial Larkspur)

ONE of the most exquisite blue-tinted flowers that we have. Very effective planted in beds, masses or borders. Plant 1½ to 2 feet apart each way. Perennial varieties should be sown in the fall or early in the spring, transplanting to the open ground. Hardy Perennial.

-Belladonna. (Everblooming Hardy Larkspur.) Free blooming Hardy Larkspur, never being out of flower from the end of June until frost. The clear turquoise-blue of its flowers is not equaled for delicacy and beauty by any other flower.....

Bellamosum. This variety is identical in habit and growth with the Belladonna, but with rich, deep blue flowers. 10c pkt.

Mixed Chinese Varieties. This mixture contains a great variety of shades, from pure white to gentian-blue. 10c pkt.

ANNUAL DELPHINIUMS. (See Larkspur.)



DIANTHUS, or Pinks

THIS elegant family contains many of the most valuable and popular flowers in cultivation. All the sorts classed as annuals may be sown directly in the garden as soon as danger from frost is past, and will in a short time become a mass of bloom, and so remain all summer. Elegant as cut flowers for bouquets, as the stems are good. Grow about one foot high, and are of easiest culture. Half-hardy Annual.

Double Annual Pinks

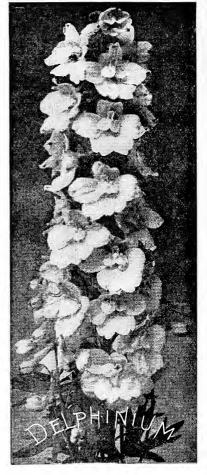
-China Pinks. (Chinensis fl. pl.) Large double, fragrant flowers. Mixed 184---China colors......10c pkt.

-Royal Pink. (Dianthus Heddewigi Nobilis.) The flowers are very large and the petals are frilled and fringed. The colors are of a deep yet very bright blood-red, then shade to carmine and pink and even

Hardy Garden Pinks

This splendid class of Pinks should be in all gardens. They have the htful clove fragrance. Half-hardy Perennial. delightful clove fragrance.

—Double Large-Flowering Grass, or Spice Pinks. (Plumarius Semperflorens, fl. pl.) One foot high. The flowers, which are beautifully fringed, are much larger and more double than the old varieties, while the colors are far richer. They emit a delightful, sweet-scented, spicy odor. Perfectly hardy, requiring only the ordinary culture of Pinks. 10c pkt.



DIANTHUS BARBATUS. (See Sweet William.)

DIDISCUS (Blue Lace Flower)

—Coeruleus. This pretty and interesting annual blooms most profusely from July till November; also used extensively for early spring flowering in a cool green house; their exquisite pale lavender blossoms are excellent for cutting; plants grow about 18 inches high, and have a many as 50 flowers open at one time...........10c pkt. 187-Coeruleus.

DIGITALIS (Foxglove)

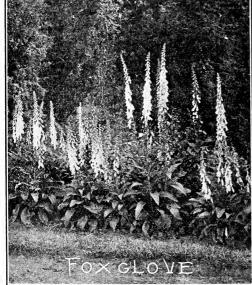
HANDSOME and highly ornamental hardy plants of stately growth. They are now used extensively with good effect for naturalizing in shrubberies, the edge of woods and other half-shady places; 3 to 5 feet. Hardy Biennial. (See cut.)

DOLICHOS (Hyacinth Bean)

RAPID-GROWING annual climber. flowering freely in erect racemes, followed by ornamental seedpods; for covering arbors, trellises, etc. Tender Annuals.

192-Finest Mixed. Purple and white ... Oz., 15c; 10 pkt.





All 10c Packets of Flower Seeds are 3 Packets for 25c. 13 Packets for \$1.00.

ESCHSCHOLTZIA

(California Poppy, Gold Cups)

SHOWY, free-flowering plant of low-spreading growth, with finely divided foliage, blooming throughout the season. Seed should be sown thinly in shallow drills early in spring. Hardy Annual. (See cut.)

193-Carmine King. A beautiful carmine-rose color, as intense on the inside as on the outside of the petals, which gives it an altogether novel and beautiful effect......Oz.. 50c: 10c pkt.

194-Golden West. The flowers measure from 3 to 6 inches in diameter; they have large, overlapping petals, often daintily waved at the edges. Color, light canary-yellow, with an orange blotch at the base of the petals, which often suffuses the whole flower......Oz., 30c; 10c pkt.

195-Hybrida Grandiflera. New large flowering, erect type containing a large percentage of new shades and includes soft pink, scarlet, chrome-copper red, claret and royal purple....3 pkts., 25c; 10c pkt.

196-Mixed. Single cup-shaped flowers in shades of bright yellow, deep orange, pink and silvery white. Oz., 30c; 10c pkt.

BUSH ESCHSCHOLTZIA. (See Hunnemannia.)



STRONG-GROWING annuals, suitable for beds of tall-growing plants or mixed borders; the flowers are inconspicuous; but the foliage is exceedingly ornamental Hardy Annual.



7 — Variegata. (Snow on the Mountain.) At-tractive foliage, tractive foliage, veined and margined with white; 2 feet...10c pkt.

98— Heterophylla. Annual Poinsettia, Mexican Fire Plant Painted Leaf. The plant grows 2 to 3 feet high of branch-ing, bush-like form, with smooth, glos green leaves, which about mid-summer become a beautiful orange-scarlet, presenting a striking and brilliant appearance..10c pkt.

FEVERFEW. (See Pyrethrum and Matricaria.)



EVERLASTING, ETERNAL, or STRAW FLOWERS.
(See Acroclinium, Ammobium, Gomphrena, Helichrysum, and Xeranthemum.)
FLAX, Scarlet. (See Linum.)
FORGET-ME-NOT. (See Myosotis.)
FOUR-O'CLOCKS. (See Marvel of Peru.)
FOXGLOVE. (See Digitalis.)

GOMPHRENA (Globe Amaranth)

GAILLARDIA (Blanket Flower)

ANNUAL VARIETIES

Splendid, showy annuals; in bloom from early summer till November; excellent for beds, borders or for cutting. Half-hardy Annual.

209-Picta Lorenziana. Double-flowering mixed...10c pkt.

HARDY PERENNIAL VARIETY
Thrives in almost any position or soil and requires little or no protection. If sown early, begins flowering in July, continuing a mass of bloom until frost, fine for cutting. Hardy Perennial. (See cut.)

210—Grandiflora. A compact variety, forming bushy plants 12 to 15 inches high, and bearing its long-stemmed flowers well above the foliage......10c pkt.



BEING of rapid growth, they are fine to cover old fences, trellises, stumps, etc. Do not plant the seed till all danger of frost is over, and select rich, mellow ground. Tender Annual climbers, over, and 10 to 20 feet.



199-Calabash, or Dipper. Long, slim handle......10c pkt.

200—Dish Cloth. Clusters of large, yellow flowers. The fruit, when dried, is used as a dish cloth 10c pkt. 201-Giant Bottle. Large and orna-

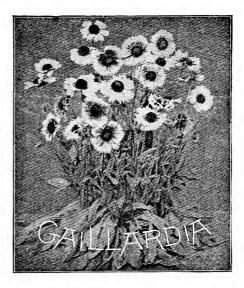
mental.....10c pkt.

202-Hercules Club. A curious sort, club-shaped......10c pkt.

204-Orange. The well-known orange......10c pkt.

205-Pear-Shaped. Green and white striped.....10c pkt.

206—Sugar Trough. Used for buckets. Very large......10c pkt. 207-MixedVarieties. 1/4 oz., 25c; 10cpkt.



GRASSES (Ornamental)

FOR large beds or groups on lawns nothing gives a finer effect, and they are now largely used in prominent positions in many of the finest public parks, etc. When carefully dried they are useful in making up winter bouquets. Out when in full bloom, and before the flowers get too old; the in small bunches and hang up in a dry, dark place, with the heads downward.

-Bromus Brizaeformis. A graceful variety with drooping panicles, flowering the first season. Hardy Perennial; 1 foot......10c pkt.

-Coix Lachrymae. (Job's Tears.) Broad, corn-like

GYPSOPHILA (Baby's Breath)

PRETTY free-flowering plants, succeeding in any garden soil. Their misty white panicles of bloom are largely used for mixing with other cut flowers.

-Elegans Grandifiora Alba. This is an improved large-flowering pure white form of the annual Baby's Breath. Half-hardy Annual......Oz.. 30c; 10 pkt.

219-Elegans Carminea. Bright carmine-rose

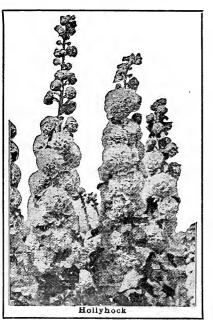
Oz., 40c: 10c pkt.

Paniculata. White flowers, fine for bouquets; blooms first year if sown early. Hardy Perennial; 2 feet. 10c pkt.

Paniculata Flore Plena. A great improvement on the single flowered type and more lasting; the flowers forming miniature balls of white petals. Not quite fixed but about 25 per cent come true......10c pkt.

GREVIL'LEA (Silk Oak)

BEAUTIFUL and graceful decorative plant with fern-like foliage; excellent for table decoration; easily raised from seed; producing a good sized plant in a short time. —Robusta. Orange colored flowers 10c pkt.





HELICHRYSUM (Straw Flower)

-Monstrosum. Everlasting flowers, large and full. Colors, white, yellow and red. Cut before the flowers fully expand. Hardy Annual. Mixed....10c pkt.

HELIOTROPE (Cherry Pie)

A HALF-HARDY Perennial, flowering during the whole season; its delightful perfume makes it a most desirable bouquet flower; a splendid bedding plant, or can be trained as a greenhouse climber. Seed started indoors in the spring will make fine plants for summer blooming. Choicest Mixed; from new varieties 10c pkt.

HESPERIS MATRONALIS

HIBISCUS (Marshmallow)

HOWY ornamental perennial plants, for mixed beds or shrubbery borders; blooms first year if sown early.

226—Mallow Marvels. Immense flowers 8 to 10 inches in diameter, in the following colors; fiery crimson, blood red, shell pink and white. Their great beauty surpasses all other perennials in profusion of bloom and brilliancy of color. They come up year after year and are absolutely hardy. Hardy Perennial. (See cut.).....10c pkt.

HOLLYHOCK

ONE of the most majestic of hardy plants, and a clump or line in any garden gives an effect not attainable with any other plant. For planting among shrubbery or forming a background for other flowers it is without an equal. Seed sown any time before mid-summer will produce fine plants for flowering next year. To get results this season it is necessary to get year-old plants. These we offer with other hardy plants under their proper heads. Hardy Perenntal.

227—Chater's Double Pink. 10c pkt.
228—Chater's Double Rose. 10c pkt.
229—Chater's Double Scarlet 10c pkt.
229—Chater's Double Scarlet 10c pkt.
231—Chater's Double Wilte 10c pkt.
231—Chater's Double Wilte 10c pkt.
232—Chater's Double Yellow 10c pkt.
233—Mater's Prize, Double Mixed. This strain stands unrivaled in richness and delicacy of coloring, with magnificent spikes of very double flowers. (See cut.) 10c pkt.
233—Mammoth Fringed Allegheny. Mammoth flowers of loosely arranged fringed petals. The colors vary from the palest shrimp pink to deep red. The plants are of strong growth, sending up-spikes 6 to 7 feet high. 10c pkt.
234—Single. Many prefer the single flowering. They are usually of freer growth and present a handsome appearance when covered with their artistic blossoms. Finest mixed; all colors. 10c pkt.

HONESTY (Moonwort, Satin Flower)

-Greatly admired for its silvery seed pouches, which are used for house ornaments; two feet. Hardy Biennial................10c pkt.

-Japonicus. A very ornamental and fast-growing climbing plant. The foliage resembles that of the common Hop, is very dense, and in color a lively green. Hardy Annual. 14 oz., 20c; 10c pkt.

HUNNEMANNIA

(Giant Yellow Tulip Poppy, or Bush Eschscholtzia)

238—Fumariaefolia. This is by far the best of the poppy family for cutting, remaining in good condition for several days. Seed sewn early in May will, by the middle of July, produce plants covered with their large buttercup-yellow, poppy-like blossoms, and never out of flower until hard frost. The plants grow about 2 feet high, are quite bushy, with beautiful feathery glaucous foliage. Half-hardy Annual. 10c pkt.

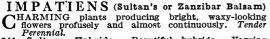
HYACINTH BEAN. (See Dolichos.)

IBERIS (Hardy Candytuft)

ICE PLANT

240—Mesembryanthemum Crystallinum. Handsome and curious plants for hanging baskets, rock-work, vases and edgings. The leaves and stems are covered with crystalline globules, giving it the appearance of being covered with ice. Succeeds best in a sandy soil and warm situation. Tender Annual......10c pkt.

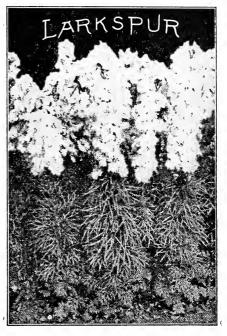
IPOMEA. (See Cypress Vine, Moonflower and Morning-Glory.)



JOB'S TEARS. (See Ornamental Grasses.)

KUDZU VINE

-Pueraria Thunbergiana. It will grow 8 to 10 feet the first year from seed, and after becoming established will produce vines 50 feet high in a season, sometimes growing 12 inches in a single day. Produces a tuberous root which is perfectly hardy. Unequaled for porches, arbors, trellises, etc. Hardy Perennial. 10c pkt.



KOCHTA

(Summer Cypress, Belvedere or Burning Bush)

FORMS regular pyramids about 3 feet high, having a cypress-like appearance. The leaves are light green until September, when they change to carmine and blood red. Sow indoors in April and plant out in May, or sow in open ground about May 1st. Hardy Annual. (See cut.)

-Kochia Childsii. This new variety produces plants that grow three to four feet high, dense, strong and symmetrical. The foliage is green all summer, but at touch of frost it changes to dark claret-red and does not die until Christmas or later. A splendid plant to divide the vegetable from the flower garden or for forming a summer hedge for any purpose. Also desirable as a not plant. desirable as a pot plant.....

LANTANA

LAVENDER (Lavandula Vera)

245—Well known, sweet-scented. Hardy Perennial; should be extensively grown in the mixed border; 2 feet......................10c pkt.

LARKSPURS, Annual

THIS is one of the best known of garden flowers. Seeds sown in the open ground before the close of April will produce flowering plants by the beginning of July, and give a continuous succession of flowers from then until frost. Hardy Annual.

Double Stock-Flowered. The finest variety with splendid spikes of beautiful double flowers; 2 ½ to 3 feet.

249—Scarlet......10c pkt. 250—White.....10c pkt. 246-Dark Blue.....10c pkt. 247-Light Blue 10c pkt.

248-Pink......10c pkt.

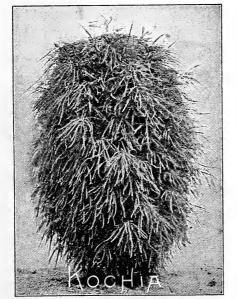
251-Collection: One packet each of the above five varieties, 40c.

> (For Hardy Perennial Larkspurs see Delphinium) (LADY SLIPPER. See Balsam.)

L'ATHYRUS (Everlasting, or Hardy Sweet Pea)

Showy, free-flowering climbers for covering old stumps, fences, etc., continually in bloom; fine for cutting. Hardy Perennial.

-Latifolius—White Pearl. The finest white variety...10c pkt. - "Pink Beauty. Rosy pink......10c pkt. - "Mixed. All colors...½ oz., 15c; oz., 40c; 10c pkt. 253



LINUM (Flax)

—Grandiflorum Rubrum. (Scarlet Flax.) One of the most effective and showy bedding plants, of long duration, having fine foliage and delicate stems, with brilliant, scarlet-crimson flowers. Hardy Annual: 1 foot.

LOVE IN THE MIST. (See Nigella.)

LOBELIA

THE following choice varieties of this popular and beautiful flowering plant will be found most desirable for pot culture, edgings, hanging baskets, etc., blooming profusely from June to November. Half-hardy Annual.

257-Crystal Palace Compacta. Rich blue; finest for bed-

LUPINUS (Lupine)

MARIGOLD (See also Calendula)

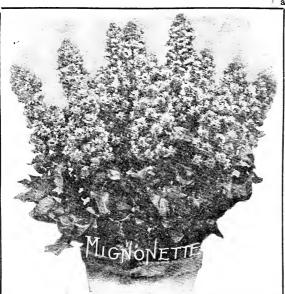
THE African and French Marigolds are free-flowering annuals of easy culture; the former have uniformly large, yellow or orange colored flowers. (See cut.) The latter are dwarfer in growth, with beautifully striped flowers. They succeed best in a light soil, with full exposure to the sun. Half-hardy Annual. hardy Annual.

African Varieties

French Varieties

MARVEL OF PERU. or Four O'Clock (Mirabilis Jalapa)

267—A well-known free-flowering garden favorite; does well everywhere; give each plant 12 to 18 inches of room. Half-hardy Perennial. Finest mixed...Oz., 30c; 10c pkt.





MATRICARIA

MAURANDIA

Beautiful, rapid, slender growing climbers, blooming profusely until late in the autumn; also fine for the conservatory or greenhouse. A Half-hardy Perennial, flowering the first season if sown early.

269-Finest Mixed. All colors......10c pkt.

MIGNONETTE (Reseda)

A well-known favorite. No garden is complete without a bed of Mignonette. Half-hardy Annual. (See cut.)

MIMOSA (Sensitive, or Humble Plant)

273—Pudica. Curious and interesting annual, with pinkish-white flowers, the leaves close and droop when touched or shaken. Half-hardy Annual. 10c pkt.

MIMULUS

Fine for shady situations; blooming the first year from seed if sown early: 1 foot. Half-hardy Perennial. 274—Tigrinus. (Monkey Flower.) Fine mixed spotted varieties...........10c pkt.

MOON FLOWER (Ipomoea Noctiflora)

Climbers of rapid growth, with beautiful and varied flowers; for covering walls, trellises, arbors or stumps of trees.

275—Cross Bred or Hybrid Moon Flower. At night and during dull days the plants are covered with an abundance of large, pure-white, fragrant flowers, 5 to 6 inches in diameter. It is a rapid grower, and within a few months will grow as much as 40 feet. To insure germination, take a sharp knife and cut a small nick in shell of each seed, and soak in warm water for about 4 hours before planting.

Tender Perennial. 14 oz., 25c; oz., 80c; 10c pkt.

Moon Flower Plants. Each, 30c; per doz., \$3.00; by mail, each 35c.

All 10c Packets of Flower Seeds are 3 Packets for 25c. 13 Packets for \$1.00.

THE Morning Glory is too well known to need a description. Succeeds under almost all circumstances. Hardy Annual.

MYOSOTIS (Forget-Me-Not)

The Forget-Me-Nots succeed best in shady, moist situa-s. Half-hardy Perennial. tions.

278—Alpestris Victoria. Early flowering, of bushy habit, bearing large, bright, azure-blue flowers.......10c pkt.
279—Palustris Semperflorens. A dwarf Forget-Me-Not continuing in bloom from early spring until autumn; blue flowers........10c pkt.

NICOTIANA

(Sweet Scented Tobacco Plant)

ONE of the easiest annuals to raise and one of the most effective. The blossoms in shape are not unlike a Petunia blossom, but with a longer tube. The flowers open toward evening and emit a powerful perfume. Hardy \bar{Annual}

-Affinis Hybrids. Large, pure white flowers of delicious fragrance. If taken up in the fall, cut back and potted, they will bloom all winter......10c pkt.

NASTURTIUMS

FOR ease of culture, duration of bloom, brilliance of coloring and general excellence, nothing excels Nasturtiums. All they need is a moderately good soil in a well-drained sunny position. The varieties offered below were selected from a very large number of sorts as being the best and most distinct. Half-hardy Annual.

Tall or Climbing Varieties

Elegant and luxurious climbers for verandas, trellises, etc. May be used to cover unsightly railings and to trail over rough ground with fine effect. The seed pods can be gathered while green and tender for pickling; 6 to 10 feet.

-Chameleon. Different richly-colored flowers on the 282same plant.

283-Crimson. Rich and velvety.

284-Eward Otto. Lilac-brown.

285-Gold Garnet. Orange-yellow, with garnet blotches.

286—Jupiter. Golden yellow; large flowered.
287—King Theodore. Deep crimson-maroon, dark foliage.

288-Orange. Pure orange; no markings.

289-Pearl, or Moonlight. Creamy white.

290-Ruby. Deep scarlet flowers.

291—Schulzii. Rosy-scarlet flowers, dark foliage.

292-Twilight. Bright yellow, marbled salmon-rose.

293-Vesuvius. Rich glowing salmon color.

Price-Any of the above Tall sorts.

Oz., 25c; 1/4 lb., 65c; 10c pkt. 294—Collection. 295—Collection. 12 varieties.......90c.

Contains all the mew Giant Flowering with the many other grand new hybrids, embracing every shade and tint of yellow, rose, scarlet, orange, carmine, violet, purple, lemon, bronze, maroon, ruby, cream and pink, both in solid colors and mottled and striped.

Lb., \$1.50; ½ lb., 50c; oz., 20c; 10c pkt.

297—Mixed Tall Nasturtiums. For the low price, this mixture is very choice but will not give as fine flowers as our "Premier" listed above.

Lb., \$1.00; 1/4 lb., 35c; oz., 15c



Dwarf, or Bedding Varieties

HEY are suitable for hanging baskets, vases, window boxes, bedding and edging; grow quickly. thrive in the poorest soil and furnish the greatest abundance of long lasting, sweet-scented cut flowers.

298-Beauty. Yellow, striped red.

299—Chameleon. This interesting variety produces flowers of different colors on the same plant.

300-Crystal Palace Gem. Sulphur, spotted maroon.

301-Empress of India. Crimson flowers, dark foliage.

302—Golden King. Brilliant yellow.
303—King of Tom Thumbs. Intense deep scarlet flowers, dark foliage.

304-King Theodore. Dark maroon, bluish-green foliage.

305-Pearl, or Moonlight. Creamy white.

306—Prince Henry. Golden yellow, marbled and spotted with brilliant scarlet.

307-Regialianum. Deep purplish-crimson.

308-Rose. Salmon-rose.

309-Vesuvius. Brilliant salmon-pink.

309—Vesuvius. Brilland Survey.

Price—Any of the above Dwarf sorts.

Oz., 25c; ½ lb., 65c; 10c pkt.

50c.

6 varieties......50c. 310-Collection.

311—Collection. 12 varieties.....

Will give a larger variety of colors in even proportions than any other Nasturtium mixture, for it is put up by ourselves from named sorts, and also contains a large share of the Liliput Nasturtium and of the Dwarf Chameleon which have the richest and most varied combination of colors ever produced, showing odd colors hitherto unknown among flowers.

Lb., \$1.50; ½ lb., 50c; oz., 20c; 10c pkt.

313—Dwarf Nasturtiums Mixed. We handle such large quantities of Dwarf Nasturtiums that we are able to offer this especially choice mixture at a very low price. See also our "Premier" mixture listed above.

Lb., \$1.00; ¼ lb., 35c; oz., 15c.

TROPAEOLUM CANARIENSE.

· (See Canary Bird Flower.)



NIGELLA

(Love in a Mist, or Devil in the Bush)

Lovely variety giving an abundance of long-stemmed flowers, prettily set in slender elegant foliage. The plants are extremely hardy, and an autumn sowing produces the best specimens for flowering in the following summer. Height, 18 inches. Hardy Annual.

314-Finest Mixed......10c pkt.

PANSY

PANSY seed has always been a leading specialty with us. Seed germinates best while soil is still cool and moist. Would advise sowing in shallow drills in seed-bed early in spring when the trees are starting out in leaf, and again in September when the weather becomes cool. Plants from the spring-sown seed flower with great freedom throughout spring, summer and fall, while the stocky young plants grown in fall and winter produce the largest plants grown in fall and winter produce the largest and finest flowers early the following spring. Take care of the weakest looking seedlings, as they usually give the finest flowers. Half-hardy Perennial.

Giant Flowered Pansies

-Cassier's Giant. A very showy strain saved from large and beautifully blotched flowers.

1/8 oz., 60c; 15c pkt. 320—Golden Queen. Golden yellow, very fine. 1/8 oz., 50c; 10c pkt.

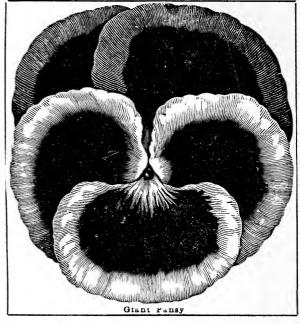
321-King of Blacks. Lustrous jet black flowers of immense size.....½ oz., 50c; 10c pkt.

-Madame Perrett. Colors dark wine, pink and red, with edges of petals frilled and bordered white.

// oz., 50c; 10c pkt.

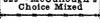
Masterpiece. The enormous flowers are borne well above the foliage on strong stems. The petals of the flowers are waved or curled and contain the richest colors. Each petal is distinctly marked with a large dark blotch and most of the flowers are margined with a light, white or yellow edge... 1/2 oz., 60c; 15c pkt.

325—Snowflake. The finest and largest pure white flowers. 1/2 oz., 50c; 10c pkt.



The cream of American and European Specialists. In this magnificent mixture of mammoth-flowering Pansies the blossoms are borne on long stems well above the foliage and are distinguished for their gorgeous and varied colorings and beautiful markings; of fine substance, velvety texture, perfect form, and giant size, frequently measuring 3 inches in diameter. The colorings are wonderfully rich and varied; every shade and tint of rose, canary-yellow, black, white, cream, lavender, garnet, sky-blue and orange are produced in endless variation... 1/2 oz., \$1.00; 1/2 oz., \$1.25; 25c pkt.

329 - McCullough's Choice Mixed Great diversity of colors, free flowering; blossoms are slightly smaller than the Giant sorts. 1/2 02., 25c; 10c pkt.



Violas, or Tufted Pansies
(Also known as Pansy Violets, Johnny-Jump-Ups, etc.)

Our improved strain produces beautiful Pansy-like blossoms, of most brilliant colors and markings. The plants are more hardy than Pansies, and of vigorous growth, forming deep-rooting, compact, tufted clumps. Planted in masses or lines they form perfect mats covered with myriads of flowers from spring until cold weather.

330-McCullough's Special Mixture ... 1/8 oz., 50c; 10c pkt.

PETUNIA

For outdoor decoration or house culture few plants equal the Petunia in effectiveness. Easily cultivated, only requiring a good soil and sunny position. Hardy Annual.

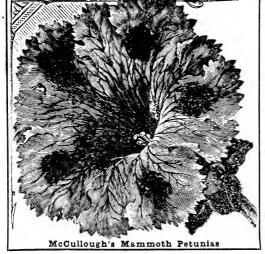
Double Large-Flowering

IT IS well known that seed saved from the most carefully hybridized flowers produces but a small percentage of double flowers, the balance being singles of unusually fine quality. The weaker seedlings should be carefully saved, as these invariably produce the finest double flowers.

One of the finest 331—McCullough's Splendid strains in existence.

Double Fringed strains in existence.
The double flowers are very large, full and eautifully formed, with the edges of the petals elegantly.

fringed.....35c pkt. -Large Double Mixed. Choice strains of fine colors and large flowers......25c pkt.



All 10c Packets of Flower Seeds are 3 Packets for 25c. 13 Packets for \$1.00.

PETUNIA—Continued

Single Large-Flowering

THE weaker seedlings produce the finest flowers of best colorings. It is best to sow large-flowering Petunias indoors and transplant to the open in May. Single Bedding kinds can be sown right out of doors in May.

This mixture is made by ourselves and includes, bestides the Ruffled and California Giants, all the colors of the large-flowering and fringed sorts, and the unsurpassed Superbissima varieties with their delicately veined throats in various colors and their truly mammoth flowers.

This mixture is made by ourselves and includes, bestides the Ruffled sorts, all the colors of the Ruffled sorts, all the colors and their truly mammoth flowers.

3 pkts, 50c; 20c pkt.

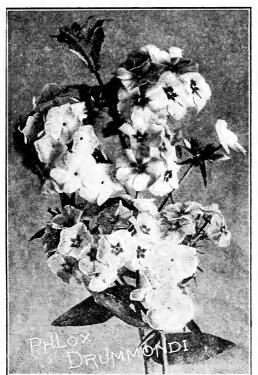
334—Ruffled Giants. Very large flowered; ruffled, fluted and fringed, striped and mottled. blotched and solid self-colors. 2 pkts., 25c; 15c pkt.

Single Bedding Petunias

342—Striped and Blotched. Fine for massing.

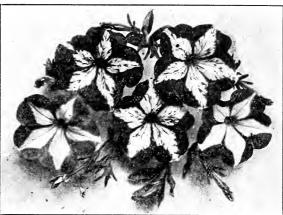
343—McCullough's "Selected" Bedding Varieties, Mixed Superb strain. 1/4 oz., 40c; 10c pkt.

Fine Mixed. Good.....



See McCullough's Collection of 'Easy to Grow''Flower Seed. It may save you money.

Illustrated on last page of cover.



Howard's Star Petunia

Balcony Petunias

A splendid free-flowering type, for bedding, window boxes, vases, hanging baskets, etc.

345—Balcony Blue. Rich velvety violet.

15 oz., 50c; 15c pkt. 346-Balcony Purpurea. Dark red.

McCULLOUGH'S Annual Phlox

FEW flowers are so easy to grow from seed, so pretty and compact in habit, so quick to bloom, or give such a brilliant display of color for so little cost and care. The first sowing should be made as soon as the frost is out of the ground in spring, later ones in May, either where the plants are to bloom or in a seed-bed, as the Phlox transplants readily. (See

Phlox Drummondi

McCullough's Giant Phlox

Is a special mixture of Phlox:

Phlox, Large-Flowering Dwarf

A type combining the size of the individual flower and head of the Grandifloras, but of dwarf. compact growth.

1/8 oz., 30c; 10c pkt.

Hardy Perennial Phlox (P. Decussata)

StimUplanT Makes a Wonder Garden

StimUplanT Makes a Wonder Garden

POPPIES

Double Annual Poppies

THEY make a gorgeous show during their flowering period, and are largely used for beds and borders. Should be sown as early in the spring as possible where they are remain, as they do not stand transplanting. Sow very inly. Hardy Annual.

359 — McCullough's Special Mixture of Double Poppies

This includes all the choicest sorts and will produce charming flow-ers in an endless variety

Single Annual Poppies

ANNUAL Poppies should be sown as early in the spring as possible where they are to remain, as they do not stand transplanting. Sow very thinly. If they come up too thickly they must be thinned out to stand 3 to 4 inches or more apart if you wish best results. Hardy Annual.

They are single and occasionally semi-double, and range in color from the purest white through the delicate shades of pale pink, rose and carmine to the deepest crimson and blood-red, while many are daintily edged and striped. In fact, so varied are they that scarcely any two flowers are exactly alike. (See cut.)

1/4 oz., 15c; oz., 40c; 10c pkt.

361—McCullough's Special Mixture of Single Poppies

This mixture includes all the choicest Poppies and is really extra choice......½ oz., 15c; oz., 25c; 10c pkt.

Hardy Perennial Poppies

ORIENTAL Poppies should be sown in early spring in the open ground as soon as it is fit to work. The plants disappear during July and August, appearing again as soon as the weather gets cool. When this fall growth starts is the time they should be transplanted to their permanent flowering quarters. It is well to mark the places they are planted with a stake to insure the roots against disturbances during their annual resting period.

(The large Oriental Poppy.) -Orientale. (The large Oriental Poppy.) A charm-ing summer-flowering hardy plant, producing numerous leafy stems about 2½ feet high, with large, deep crim-son flowers, having a conspicuous black blotch on each petal; exceedingly showy..½ oz., 25c; 10c pkt.

363 - McCullough's | Special Mixture of Special Mixture of Orientale Hybrids many novel colors.....





Iceland Poppies (Papaver Nudicaule)

WHILE these are hardy perennials, they flower the first year from seed, blooming almost as quickly as the annual sorts. They are of graceful, neat habit, with bright green, fern-like foliage, formed in tufts from which issue slender stalks about 12 inches high, bearing their brilliant flowers in endless profusion; most useful for cutting, for which purpose pick when in bud, for if the seed pods are picked off, they continue in flower the entire season. They remain evergreen throughout the winter, coming into bloom early the following spring. Hardy Perennial.

364-Finest Mixed. All colors..... 1/4 oz., 25c; 10c pkt.

PORTULACA (Sun Plant or Rose Moss)

NE of our finest *Hardy Annual* plants, of easy culture, thriving best in a light loam or sandy soil, and luxuriating in an exposed, sunny situation, the flowers are of the richest colors, and produced throughout the summer in great profusion; fine for massing in beds, edgings or rock-work; 6 inches. (See cut.)

365-Single Mixed Colors......Oz., 60c; 10c pkt.

PYRETHRUM

ONE of the most valuable of our summer flowers. They flower in May and June, and frequently in August and September the second time. Hardy Perennial.

-Hybridum Grandiflorum. This large flowering single strain is saved from a fine collection. Bears large Daisy or Cosmos-like flowers, ranging in color from light pink to deep red, with bright yellow centers; blooms in May and June and again in the fall. One of the most graceful and long-lasting cut flowers.

''A oz., 50c; 10c pkt.

-Pyrethrum Aureum. It is the well-known Golden Feather used for edging, carpet-bedding, etc..10c pkt.

PRIMULA

THE beautiful Chinese Fringed Primroses and Obconica and Forbesi varieties are indispensable for winter or spring decorations in the home or conservatory. They are among the most important winter blooming pot plants. The seed we offer has been saved from the best strains of English and Continental growth. Sow in March, April or May. The hardy varieties are also deserving of wide cultivation.

Primula Chinensis Fimbriata

The seed should be sown in light soil, but for final potting a richer soil is necessary, consisting of two parts loam to one each of well decayed manure and leafmould. *Greenhouse Perennial*.

20c pkt.
373—Delicata. Delicate rose, finely fringed.
20c pkt.

374—McCullough's Choicest Mixed This mixture contains nothing but the finest sorts of Chinese Primroses. (See cut.)

20c pkt.

Primula Obconica

THESE are of the easiest culture in greenhouse or light window of dwelling house, flowering abundantly and continuously with little care, and should be sown during the spring in good, porous loam. They will not germinate well in any compost containing peat or leaf-mould. To develop the colors to the highest degree, grow in heavy soil, and at a temperature as near 60 degrees as possible. The Grandiflora varieties are the freest flowering, but lack the very large individual blooms of the newer Gigantea type. Greenhouse Perennial.



RICINUS (Castor Bean) Zanzibariensis



376—Primula Obconica Gigantea. This new variety is the finest yet introduced; of strong, vigorous growth with immense heads of large individual blooms. Varies in color from pale lilac to rose, white and red.
15c pkt.

Hardy Primroses

378—Veris. (Polyanthus.) Splendid colors: extra fine. 10c pkt.

Primula, Various Sorts

380—Forbesi. (Baby Primrose.) This is the freest-flowering Primula we know of. The little plants throw up tiny rosy-like flowers when only a few weeks old.....10c pkt.

81—Malacoides. A fine house plant, somewhat like P. Forbesi, but larger in all its parts, flowers delicate lilac. 15c pkt.

RICINUS (Castor Bean)

K NOWN as "Castor Oil Plant" and "Palma Christi." Highly ornamental and stately growing plants of tropical origin, with luxuriant foliage of varied colors and brilliant colored fruit. Sow as soon as the ground is warm. Half-hardy Annual.

SALPIGLOSSIS (Painted Trumpet)

THE blossoms are tube shaped much like a Petunia, but rivaling the latter in the beautiful colors displayed. Seed should be sown early in spring in a hot-bed or window and transplanted when weather is settled, or directly out-of-doors after danger of frost is past. Half-hardy Annual.

385—McCullough's Special Mixtures This mixture is put up by ourselves from separate varieties and is without doubt the best mixture obtainable. . . % oz., 25c; 10c pkt.

SALVIA (Flowering Sage)

SEED should be sown as early as possible, either indoors or in a hot-bed, and the young plants transferred to their flowering quarters when the weather has become settled and warm. hardy Perennial.

—Patens. A tender perennial variety: flowers intense bright blue, of large size; a beautiful plant for the border; can be kept as a house plant in a warm room...20c pkt.—Splendens. (Scarlet Sage.) One of the finest summer and fall plants with magnificent brilliant scarlet flowers;

......½ oz., 35c; 10c pkt.

SCABIOSA

(Mourning Bride, Sweet Scabious, Pincushion Flower)

The beautiful flowers in exquisite shades are borne on long stems, and when cut keep in perfect condition for the best part of a week. Hardy Annual.

390—Azure Fairy. Lavender blue.
391—Crimson. Rich, rosy crimson.
392—Pink. Delicate tone of pink.
393—Rose. Soft rose color.

394-White. hite. Pure white. of the above colors.

395

Scabiosa, Hardy Perennial Varieties

396—Caucasica. (Blue Bonnet.) Especially valuable for cutting, the blooms lasting a long time in water; lilac-blue; 3 feet. Hardy Perennial......10c pkt.

SCARLET RUNNER BEANS

—A great favorite in Europe, not only as an ornamental climber, but for the delicious, edible pods which succeed the bright scarlet, pea-shaped blossoms. Tender Annual.....10c pkt.

SENSITIVE PLANT. (See Mimosa.)
SHASTA DAISY. (See Hardy Chrysanthemum.)

SMILAX (Myrsiphyllum Asparagoides)

398—Smilax is the most useful climber which adorns the greenhouse or conservatory. Tender Perennial. 1/4 oz., 25c; 10c pkt.



Bonnre Daivia



SCHIZANTHUS (Poor Man's Orchid, or Butterfly Flower)

THIS is one of the daintiest flowers, especially adapted to bordering beds of taller flowers and those of a heavier growth. The seeds germinate quickly and come into bloom in a few weeks from sowing. The florescence is such as to completely obscure the foliage, making the plants a veritable pyramid of the most delicate and charming blooms. Half-hardy Annual.

399—Mixed. A splendid mixture. Neat pyramidal bushes covered with a multitude of small butterfly-like flowers of the most brilliant and striking color designs 10c pkr.

of the most brilliant and striking color designs. 10c pkt.

STATICE. Sea Lavender

Its cloud-like masses of flowers make borders gay for a long time, and their delicate coloring and light graceful habit

long time, and their delicate coloring and upon make them fine for bouquets.

400—Sinuata, (True Blue). Beautiful rich navy-blue which does not readily fade. Fine annual for cut-flowers or everlasting bouquets. I foot... 1/2 oz., 35c; 10c pkt.

401—Latifolia, Mixed. Hardy Perennial with large, branching heads. Invaluable for the perennial border as well as for drying for winter decoration. 2 feet.

1/2 oz., 35c; 10c pkt.

STOCKS (Gilliflower)

STOCK seed may be sown in the open ground, or in the hot-bed or cold frame, but if transplanted, let this be done when the plants are small, just out of the seedleaf, or the plants become slender and never make good plants nor flower well.

A fine perpetual blooming stock, A nne perpetual foloming stock,

402—McCullough's producing one long, sturdy spike,

Cincinnati Market closely set with enormous double

flowers, A grand variety..10c pkt.

03—Princess Alice. (Cut and Come Again.) If sown

early it commences blooming in June and continues until

Giant Perfection Ten Week Stock

This magnificent strain is without a rival for open ground planting, attaining a height of 2½ feet. The spikes of bloom are long and the individual flowers are enormous in size and very double. Half-hardy Annual. (See cut.) 404—Finest Mixed Perfection. All colors......10c pkt.

Mammoth-Flowering Beauty Stock

STOKESIA (Cornflower or Stokes' Aster)

SUNFLOWER (Helianthus)

REMARKABLE for the stately growth, size and brilliancy of their flowers, making a very good effect among shrubbery and for screens. Hardy Annual.

Double Annual Sunflowers

407—Chrysanthemum-Flowered. The plants grow 6 to 7 feet and produce a great number of double flowers.

Oz., 30c; 10c pkt.

408—Globosus Fistulosus. (Dahlia Sunflower.) Flowers

-Globosus Fistulosus. (Dahlia Sunflower.) Flowers large, double, of a rich saffron color, 6 feet.
Oz., 30c; 10c pkt.

409—Mammoth Russian. Extra large flowers, with an abundance of seed......Oz., 15c; ½ lb., 25c; 10c pkt. 410-Double Varieties, Mixed......Oz., 25c; 10c pkt.

Single Annual Sunflowers

(Dwarf-Branching "Cut-and-Come-Again")

411-Stella.



Stokesia. (Corn Aster)

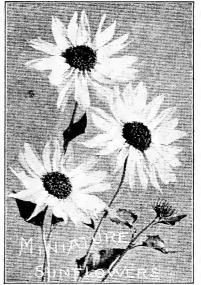
Hardy Perennial Sunflowers

Contains the finest single-flowering Hardy 412-Mixed. Conta Perennial sorts. Seeds sown early will produce flow-ering plants the first year; as subjects for the hardy border as well as for cutting, they are of great value. 14 oz., 65c; 10c pkt.

HINTS ON THE CULTURE OF FLOWERS FROM SEED

Much annoyance and disappointment may be saved by giving close attention to the follow-ing: Avoid especially deep planting; over-watering, underwatering, or sowing too thickly.





SWEET WILLIAM

(Dianthus Barbatus)

The best varie-The best varieties of Sweet William are of exceedingly beautiful colors, and the large fragrant flowers are borne in trusses of great size. They make a splendid show in the garden or hardy border and last well as cut last well as cut flowers.

Seed may be sown at any time from spring to midsummer. Seed planted early will bloom in the fall. It is better to sow seed every year to have young plants, as they flower more freely. Hardy Perennial. Height, 1½ to 2

415-McCullough's Selected Single Mixed

A very choice assortment of all the best single-flowering varieties. 1/4 oz., 20c; 10c pkt.

—Double Mixed. This mixture you will find of very superior quality; containing all colors and shades....10c pkt.

SWEET SULTANS. (See Centaurea.) SNOW-ON-THE-MOUNTAIN. (See Euphorbia.) SNAPDRAGON. (See Antirrhinum.)

All 10c Packets of Flower Seeds are 3 Packets for 25c. 13 Packets for \$1.00.

McCULLOUGH'S SELECT SWEET PEAS

It Would be an Easy Matter for Us to Greatly Extend Our List, but We Think it Best to Confine Our Offers to Such Sorts as are Really First-Class

HOW TO GROW SWEET PEAS.—The principal essential for the best success is a cool, deep, moist soil and a sunny situation. The ground should be prepared deep and rich. Fall preparation, where possible, is preferable, but if done in the spring, use no green manure. Bone meal is good if old rotted manure can not be obtained. Sow early, as Sweet Peas need the cold, moist spring ground to make the root growth. In the latitude of Cincinnati, February is not too early. In the South, sow in the fall. Sow the seed in deep furrows, the bottom of which must be at least 6 inches below the level of the soil; this is to guard against a summer drought. Cover the seeds only one inch, after which the furrow is still five inches deep. When the plants are 2 to 3 inches high, thin out to 2 inches apart and fill in another inch or so of soil around the plants, always leaving a portion of the plant above the surface; do this at intervals until the furrow is nearly full: it should always remain a little hollow to hold the rains, and to allow water to be applied by the bucketful when necessary.

During dry weather they should be watered thoroughly and frequently and given an application of liquid manure once a week. A mulch of hay or rakings from the lawn will be found beneficial during hot weather. The flowers should be picked as often as possible, and all withered blooms should be removed, to prevent the plants from running to seed, which would stop them from blooming.

Early Flowering Spencer Varieties

NOTHING within recent years can approach in importance the introduction of the "Spencer" Sweet Peas. They are distinguished from the standard sorts by the enormous flowers with crinkled and wavy petals, and also from the fact that they usually bear four blossoms on a long stout stem.

In presenting the following varieties of Spencer Sweet Peas, we wish to emphasize the fact that these are the "Early Flowering Spencers"

and are separate and distinct from the late or standard Spencer types, as they continue blooming two or three weeks longer than the standard Spencer varieties.

-Blue Bird. A charming shade of blue. Large and exquisitely waved.

-Burpee's Orange. The most outstanding Sweet Pea. It is a clear, pure orange self.

419—Columbia. The standard is bright salmon rose, the wings being pure white. Vines are strong and vigorous, bearing large well waved flowers in threes and fours.

Glitters and scintillates, with a -Glitters. fire-like sheen radiating over the flowers. The standard is a bright, flery orange and the wings are deep orange.

421—Liberty. A rich, deep, sunproof crimson. The flowers are large, well waved and borne in fours and threes. The vines are vigorous.

in fours and threes. The vines are vigorous.

422—Miss Louise Gude. The color of this charming variety is a shell-pink throughout. The flowers are large and well formed. Carried four on a stem of great length.

423—Mrs. Harding. The flowers are a beautiful shade of silvery blue, of exquisite texture, large, well waved, and displayed in fours on a long stem.

long stem.

The best early flowering sal-ea. Large, well-waved blooms -Mrs. Kerr. T. carried on long stems.

Flowers are a lovely shade of 425-Princess soft lavender, suffused mauve. Attractively waved.

The white flowers are extra 426-Snowstorm. large and of fine form.

427—Yarrawa. The color on opening is rose, changing as the flower developes, to a light pink standard, tinted buff, with blush wings. -Zvolanek's Rose. Flowers are deep pink

and large. Price—Any of the above Early Flowering Spencer Varieties. ½ oz., 35c; oz., 60c; 10c pkt.

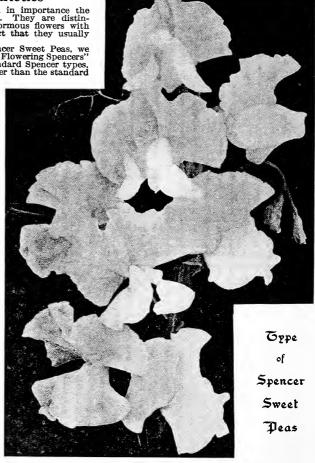
429—COLLECTION EARLY FLOWERING "SPENCER" SWEET PEAS

One (regular size) packet of each of the Twelve Early Flowering Spencer Varieties for 90c postpaid; or 6 packets for 50c, customer's selection, postpaid.

430—Early Flowering Spencers, Mixed. A carefully composed mixture of the finest standard named varieties, colors properly blended.

½ oz., 25c; oz., 40c; 10c pkt.

See McCullough's Collection of Easy to Grow" Flower Seed. They may save you money. They Illustrated on last page of cover



Spencer Varieties

431—Dobbies Cream. Deep cream or primrose colored, nicely waved, with an abundance of four-bloom sprays.
432—Fiery Cross. Color a scorching fire-red, or scarlet. It does not scorch or burn and the beautifully waved and fluted flowers are borne freely in threes and fours. long stems.

On long stems.

Hercules. A magnificent soft rose-pink. The broad and beautifully waved standards frequently measure two and one-half inches in diameter. Oz., 30c; 10c pkt.

Jean Ireland. Flowers creamy buff, standards mar-433—Hercules.

ed carmine-rose.
(Spencer Varieties continued (enext page.)

McCULLOUGH'S SELECT SWEET PEAS

SPENCER VARIETIES—Continued

- 435-King White. The grandest of all White Sweet Peas and of the most up-to-date Spencer form. largest of White Spencers and the buds are of unusual size before opening. The stems are long, stout and bear practically always four blossoms.
- 436-Margaret Atlee. The flowers are a rich glowing pink on cream ground, suffused with salmon in the standard, while the wings are pinkish-rose and salmon. The flowers are exquisitely waved, and freely produced in fours on long stout stems.
- -Margaret Madison. The flowers are azure blue, slightly tinted with mauve, of good size, both standard and wings being delightfully waved and frilled.
- -Mrs. Cuthbertson. The standard is a clear, rosepink in color, wings white, slightly flushed light rose.
- 439—R. F. Felton. The color is a soft, pleasing shade of lavender. suffused rose; wings French gray, flowers large and waved.
- 440-Rosabelle. A fine rose-colored flower, and a strong grower.
- 441-Royal Purple. A rich royal purple, a distinct color and large size.
- 442-The President. Flowers are scarlet, of largest size, carried on strong, stiff stems, usually in fours, always beautifully waved.
- Price: Any one of the above Spencer varieties, oz., 35c; 10c. pkt.

443—COLLECTION "SPENCER" SWEET PEAS

One (regular size) packet of each of the Thirteen Spencer Varieties for 90c, postpaid. 12 packets for 90c, or 6 packets for 50c, customer's selection, postpaid.

-McCullough's Special Mix-ture of Spencer Varieties

This mixture is made up by our-selves from the cream of this class

in all possible color variations, and we are confident many surprises will result, as we have included in this not only the above sorts, but many others which are new and striking in this class....1 lb.,\$1.50; ½ lb., 50c; 0z.,15c; 10c pkt.

McCULLOUGH'S "PREMIER" GRANDIFLORA MIXED SWEET PEAS

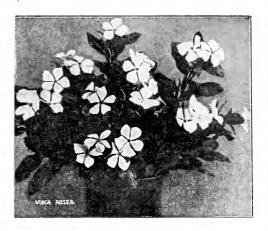
445-This mixture contains all the best-named large-flowering varieties and novelties and is undoubtedly a truly superb mixture blended by us with extraordinary care from named varieties of the most approved largeflowering type including recent American and European varieties, as well as a great many Spencer and Unwin sorts and other hybrids insuring a gorgeous color effect.....1 lb., \$1.00; ½ lb., 30c; oz., 15c; 10c pkt.

THUNBERGIA (Black-Eyed Susan)

446—Beautiful, rapid-growing annual climbers, preferring a warm, sunny situation; used extensively in hanging baskets, vases, low fences, etc.; very pretty flowers in buff, white, orange, etc.; with dark eyes; mixed colors. Half-hardy Annual. 4 feet.... 1/4 oz., 30c; 10c pkt.

TORENIA

447-Fournieri. A very fine annual; a splendid plant for vases, hanging-baskets, borders, etc.; covered the entire season with a mass of bloom. Sky-blue, with three spots of dark-blue, bright yellow center. Half-hardy Annual.....



VINCA (Madagascar Periwinkle, or Old Maid)

ORNAMENTAL, free-blooming plants and one of the most satisfactory flowering bedding plants we have. It is best to start the seed early indoors or in a hot-bed, but they begin blooming in August from seed sown out-of-doors in May, or as soon as the ground is warm, continuing until frost; or they may be potted and kept in bloom through the winter; a fine cut flower, every bud opening when placed in water: 2 feet. Tender Annual. (See cut.)

VERBENAS

O have the best results, seeds should be started early in the house and the young plants bedded out by the first of June, and they will make a lavish and showy display of flowers until frost. Half-hardy Annual.

452-Gigantea Lucifer. Flowers intense brilliant scarlet

456—Mammoth Blue. Bright one, in various shad 457—Mammoth Pink. Bright shades of pink; fine. 360z., 35c; 10c 0z., 35c; 10c 0z. 35c; 10c 0z. 35c; 10c 0z. 35c; 10c 10c pkt. 10c pkt.

458—McCullough's Mammoth Mixed Verbenas

desirable

459—Fine Mixed. A very satisfactory assortment, containing many fine colors and shades.

1/2 oz., 15c; 1/4 oz., 25c.

VIOLET (Viola Odorata)

A great favorite, suitable for groups, or borders, and much in demand on account of its profusion of bloom and delightful fragrance. Violet seeds germinate very slowly. delightful fragrance. Viole Hardy Perennial.
460—Finest Mixed......

VIOLAS, or TUFTED PANSIES. (See Pansies.)

WALLFLOWER (Goldlack)

WELL-KNOWN, deliciously fragrant, half-hardy annuals and perennials, blooming early in the spring, with spikes of beautiful flowers. They should be protected in a cold frame in the winter and planted out in April. 461—Single Mixed. Half-hardy Perennial. All colors.

462-Double Finest Mixed. Half-hardy Perennial. 10c pkt.



Wild Garden Flowers

"WILD GARDEN" FLOWER SEED

Carbon Garden FLOWER SEED

ACH package contains about 100 varieties of hardy flower seeds mixed together, and wherever planted will insure something new almost every day. Is suitable for sowing in shrubbery, under trees, and in beds on which no care will be bestowed, or even for sowing in exposed situations, where wildness is preferred to order and precision. To those who cannot bestow the necessary care required in a neatly laid out flower garden, the "Wild Garden" presents a substitute, which, for its unusual and varied effect, for cheapness and small amount of labor necessary for its construction, has no rival.

463—Dwarf Sorts. Growing from 12 to 18 inches high.

Oz., 25c; 10c pkt.

WILD CUCUMBER (Echinocystis Lobata)

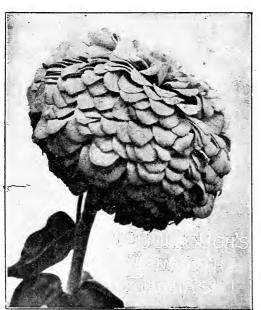
THIS is one of the quickest growing climbers on our list. Should be sown late in the fall or very early in the spring. It is thickly dotted over with pretty, white fragrant flowers followed by an abundance of ornamental and prickly seed pods. For a trellis or pillar, no annual vine is more chaste, and it will quickly cover an old tree or an unsightly building.

Hardy Annual.

202., 15c; oz., 20c; 10c pkt.

XERANTHEMUM

466—Double Mixed. Bright and pretty "Everlasting" with silvery foliage and silky flowers in pink, white and purple. Half-hardy Annual.. 14 02., 20c; 10c pkt.



ZINNIAS (Youth and Old Age)

THESE attractive and decorative half-hardy annuals are most desirable plants for mixed borders or bedding pur-■ most desirable plants for mixed borders or bedding purposes, and are remarkable for the profusion and duration of their flowers, which are extremely useful for bouquets. The double Zinnias are exceedingly handsome, the flowers being notable for their large size, fine form, brilliancy and diversity of color. The seed can be sown early in the hot-bed or light window and transplanted, or sown later in the open ground. They come into flower early in the summer and keep on blooming until hard frost. Half-hardy Annual Annual.

Dahlia Flowered

When in full bloom the flowers often measure 4 inches in depth and 6 to 8 inches in diameter, in form like a perfect decorative Dahlia. When cut from the plant and placed by Dahlias, it is difficult to distinguish one from the other. We offer the following varieties of the Dahlia Flowered

We offer the following varieties of the Dalma Floweres
Type in separate colors:—
467—Crimson Monarch. Largest and best red. 15c pkt.
468—Dream. Lavender turning to purple. 15c pkt.
469—Illumination. Deep rose. 15c pkt.
470—Oriole. Orange and gold. 15c pkt.
471—Polar Bear. Pure white. 15c pkt.
472—Scarlet Flame. Bright scarlet with a blending of orange throughout the petals. 15c pkt.
473—Collection.—One packet each of the above six varieties. 60c.

Giant Picotee

The flowers are very effective in appearance, as the edges of the petals are well marked with a distinct color to the body of the flower, making them very attractive as bedders and cut flowers.

475—Finest Mixed. All colors...... 1/4 oz., 50c; 10c pkt.

McCullough's Superb Mammoth Zinnias

This is the finest strain obtainable. The flowers are of enormous size, thickly set with velvety petals. The plants are healthy, robust, vigorous growers, branching freely, and make excellent material for groups or cutting. McCullough's Superb Mammoth will be found very superior to ordinary Zinnias. New colors have been added, depth and size given to blooms and a rich velvety lustre to the petals.

479-Mammoth Crimson. 476-Mammoth White. 480-Mammoth Scarlet. 477-Mammoth Yellow.

Contains all the colors listed above together with many new shades. Be sure and 483—McCullough's Superb Mammoth Mixed

try this wonderful strain of this grand old favorite flower.

484—Victory Quilled. The petals are quilled and twisted, the outside is of a copper-golden color and on the underside various shades of rose and lilac........10c pkt.

McCullough's

Founded 1838 Established 90 Years

Our policy adopted many years ago of carefully eliminating all undesirable varieties of Garden Seeds has been an

Selected

important factor in maintaining our high standard of quality for over three quarters of a century.

TRADE MARKS REGISTERED, MCCULLOUGH'S SEEDS, XXXX, BUCKEYE, SUBURBAN LAWN GRASS, CENTRAL PARK LAWN GRASS.

POSTAGE
VEGETABLE and FLOWER SEEDS offered in PACKETS, OUNCES, QUARTER
POUNDS and POUNDS sent postpaid at prices quoted except when otherwise noted.
When Ordering BEANS, CORN OR PEAS to be forwarded by mail, be sure to add
8 cents per pound for POSTAGE in first and second zones. For third zone add 10 cents per pound; for all other
zones add extra postage in proportion. See Postal rates, 2nd page of cover.

ARTICHOKE

One ounce will produce about 400 plants.

THE Globe Artichoke is cultivated for its flowerheads, which are cooked like Asparagus. Plants set in any good soil, with slight covering in winter, will remain in bearing several years. Seed may be sown indoors and plants potted same as the Tomato and set out in May, or can be sown in hills outside, and thinned out to one plant in each hill.

Large Green Globe.....

ASPARAGUS SEED One ounce will produce about 800 plants.

NY good loamy, not too weedy, garden land is good for growing the plants. Sow in rows 12 to 15 inches apart, as early in spring as the ground is in fit condition, and give good cultivation; also thin the plants to stand 2 or 3

inches apart.

Argenteuil. This variety is largely grown in France for the Paris market. The stalks grow to a mammoth size.....Pkt., 10c; oz., 15c; ½ lb., 30c. Barr's Mammoth. A fine green variety...Pkt., 10c; oz., 15c; ½ lb., 30c. Columbian Mammoth White. Large, white stalks.

Pkt., 10c; oz., 15c; 1/4 lb., 30c. Conover's Colossal. Large and productive. Pkt., 10c; oz., 15c; 1/4 lb., 30c. Palmetto. A very desirable variety Pkt., 10c; oz., 15c; 1/4 lb., 30c. Mary Washington. Asparagus growers whose crops are effected by rust should plant this variety as it is nearer rust proof than any other kind. The tips are tight and firm, and the stalks are large and luscious. When The tips are tight and firm, and the states are the states are bunched for market it makes a fine appearance.

Pkt., 10c; oz., 30c; ½ lb., \$1.00.

ASPARAGUS ROOTS (See Plants and Roots, end of the Vegetable Seeds.)

BEANS Dwarf or Bush

One pound will plant 200 feet of row-100 to 120 pounds per acre. THILE the Bean is a very tender plant and, therefore, should not be planted until there is no more danger of frost, still it often pays to take some risks. Plant in a warm loamy soil at the beginning of warm weather in spring and at intervals for succession until August. Rows may be made 2 feet apart and the beans planted 2 inches deep and a few inches apart in the rows, or 3 to 4 beans in hills 6 to 8 inches apart.

Cultivate and hoe frequently, always, however, when the vines are perfectly dry; working them when wet with rain or dew will cause them to rust and injure the crop. In hoeing, draw the soil up towards the rows or plants. For string Beans gather the pods clean as soon as fit for use. The plants will remain all the longer in bearing.

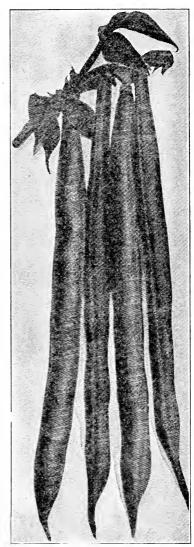
All varieties of Beans, pkt., 10c. All packets are sent postpaid; for larger quantities by mail, see "Postage" 2nd page of cover.

Green-Podded Varieties

This variety is superior to any other green-odded bean grown. It is positively string-McCullough's Norwood Stringless Green Pod.

Stringless Green Pod.

Valentine. The pods which are produced in abundance on the vines are long, straight, round, deeply saddle-backed, brittle, tender and of real good flavor. Has a much larger pod than the Valentine. Pkt., 10c; ½ lb., 20c; 1 lb., 30c; 5 lbs., \$1.40; 15 lbs., \$3.50 McCullough's Norwood Stringless Green Pod.



Norwood Stringless Green Pod

BEANS

Dwarf or Bush, Green-Podded Varieties—Continued

One pound will plant 200 feet of row.

All varieties of Beans, pkt., 10c postpaid; for larger quantities, by mail, see "Postage" 2nd page of cover.

McCullough's Improved Round Pod Red Valentine. Our stock of this is extra choice. This variety is usually ready to pick in thirty-four days after planting. The pods are very thick and fleshy, of finest quality and unequaled in uniformity of ripening, which latter fact, combined with its earliness, makes it one of the most profitable sorts for the gardener. gardener. Pkt., 10c; ½ lb., 20c; 1 lb., 30c; 5 lbs., \$1.40; 15 lbs., \$3.50.

Bountiful. An improved Long Yellow Six Weeks. Being earlier, hardier and producing better and larger pods and more of them. Pods grow to large size, are broad and fleshy; absolutely stringless, tender, of finest flavor and good appearance. Pkt., 10c; ½ lb.,20c; 1 lb.,30c; 5 lbs.,\$1.40; 15 lbs., \$3.50.

Burpee's Stringless Green Pod. This variety is stringless and remains tender and crisp. The pods are pale green, long and straight, perfectly round and meaty, maturing with the earliest of the green pod varieties.

Pkt., 10c; ½ lb.,20c; 1 lb.,30c; 5 lbs.,\$1.40; 15 lbs., \$3.50.

Full Measure (Perfection Stringless). Highly recommended as one of the most popular varieties for the Market Gardener. Very early and prolific. The pods are long, straight and handsome; meaty, stringless and of good quality; thick, flat or almost semi-round. Pkt., 10c; ½ lb., 20c; 1 lb., 30c; 5 lbs., \$1.40; 15 lbs., \$3.50.

Tennessee Green Pod. Very meaty flat pods of large size and good flavor. It is very hardy and an excellent cropper on poor soil or hillside.

Pkt., 10c; ½ lb.,20c; 1 lb.,30c; 5 lbs.,\$1.40; 15 lbs.,\$3.50.

DWARF SHELL BEANS

Horticultural Dwarf. Excellent quality as a shell bean either green or dry. Pkt., 10c; ½ lb., 20c; 1 lb.,30c; 5 lbs.,\$1.40; 15 lbs.,\$3.50.

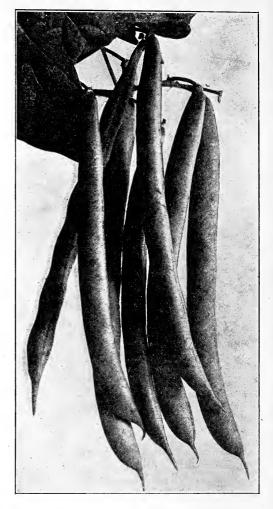
White Kidney, or Royal Dwarf. A superior kind for baking, and is also excellent when shelled green. Pkt., 10c; ½ lb., 15c; 1 lb., 25c; 5 lbs., \$1.15; 15 lbs., \$3.00.

Red Kidney. Similar to White Kidney except in color. Pkt., 10c; ½ lb., 15c; 1 lb., 25c; 5 lbs., \$1.15; 15 lbs., \$3.00.

White Marrowfat. Grown for sale as a dry bean for winter use; excellent shelled, either green or dry. Pkt., 10c; ½ lb., 15c; 1 lb., 25c; 5 lbs., \$1.15; 15 lbs., \$3.00.

Mexican or Prolific Tree. Grows 18 inches high, branching like a tree, bearing its pods so high that they do not touch the ground. Pkt., 10c; ½ lb., 15c; 1 lb., 20c; 5 lbs., 75c; 15 lbs., \$2.00.

Navy. The old standard sort for winter use. Pkt., 10c; ½ lb., 15c; 1 lb., 20c; 5 lbs., 75c; 15 lbs., \$2.00.



Dwarf or Bush, Wax or Yellow-Podded Varieties

One pound will plant 200 feet of row. All varieties of Beans, pkt., 10c. postpaid; for larger quantities by mail, see "Postage" 2nd page of cover.

Round Pod Kidney Wax. Long, round, handsome, stringless pods of large size, very solid and full of meat, crisp, brittle and free from rust. Earliest and best Wax Bean. Pkt., 10c; ½ lb., 25c; 1 lb., 40c; 5 lbs., \$1.75; 15 lbs., \$4.50.

Golden Wax, Improved. Pods long, straight, thick and vines very erect. Pkt., 10c; ½ lb., 20c; 1 lb., 30c; 5 lbs., \$1.40; 15 lbs., \$3.50.

Davis' Kidney Wax. Very productive, white-seeded, rustless string or snap variety; long, flat pods, which are very tender while young.

Pkt., 10c; ½ lb., 20c; 1 lb., 30c; 5 lbs., \$1.40; 15 lbs., \$3.50.

Wardwell's Kidney Wax. Almost entirely free from rust and spots.



The pods are long, very tender, stringless and of excellent quality. Pkt., 10c; ½ lb., 20c; 1 lb., 35c; 5 lbs., \$1.50; 15 lbs., \$4.20.

Sure Crop. Pods average six inches long, are semi-round, fleshy and entirely stringless. An early thrifty and hardy variety.

Pkt., 10c; ½ lb., 20c; 1 lb., 30c; 5 lbs., \$1.40; 15 lbs., \$3.50.

Black Wax Improved. Very early and prolific; pods round, meaty, brittle and stringless; deep golden yellow and excellent flavor.

Pkt., 10c; ½ lb., 20c; 1 lb., 30c; 5 lbs., \$1.40; 15 lbs., \$3.50.

Pencil Pod Black Wax. Magnificent straight pods six to seven inches long, light golden yellow in color, beautifully rounded, meaty and deeply saddle-backed; flesh brittle, solid and entirely stringless. fine mild flavor.

Pkt., 10c; ½ lb., 20c; 1 lb., 30c; 5 lbs., \$1.40; 15 lbs., \$3.50.

BEANS Continued Dwarf or Bush Lima

One pound will plant 100 feet of row.

THE Dwarf Lima class can not be recommended too highly. The Beans can be grown and gathered much more easily than the Pole Limas as the plants require no support. They can also be grown closer together than those of any Pole variety. Dwarf Limas are fully equal in quality to Pole Limas and as a rule are earlier maturing.

Limas require a longer season for maturing than other garden Beans. Do not plant till the ground is dry, weather warm and danger of frost is over. If possible, select rich, light soil. Plant eye downward in rows two to three feet apart, and four to six inches apart in the row, covering one and one-half to two inches deep. If planted in hills, make the hills two to three feet apart one way and two to two and one-half feet the other and plant four to six beans in a hill. Hoe often, but only when the leaves are dry.

All varieties of Beans, pkt., 10c postpaid; for larger quantities by mail, see "Postage," 2nd page of cover.

Burpee's Improved Bush Lima. Pods and beans are both larger and thicker than Burpee's Bush Lima, and fully eight days earlier. Plant is a vigorous grower with heavy foliage. Even when of full size the enormous beans are of the most luscious flavor.

Pkt.,10c; 1/2 lb.,20c; 1 lb., 35c; 5 lbs., \$1.50; 15 lbs.,\$4.20.



Extra Large Lima

Fordhook Bush Lima

This is one of the best Bush Lima Beans in cultivation. It has a distinct upright vigorous growth; the pods, which are borne in clusters well above the

Pkt., 10c; ½ lb., 25c; 1 lb., 40c; 5 lbs., \$1.60; 15 lbs., \$4.50.

Burpee's Bush Lima. This is the true bush form of the old large Lima Pole Bean. It grows vigorously to a height of 18 to 20 inches, forming a circular bush 2 to 2½ feet in diameter, requiring no poles or stakes, yielding from 50 to 100 fine pods, similar to those grown on the Large White Lima Bean.

Pkt., 10c; ½ lb., 20c; 1 lb., 30c; 5 lbs., \$1.40; 15 lbs., \$3.90.

Henderson's Bush Lima. For convenience and practical use in the home garden, it is a really good thing. It grows without the aid of poles, in compact bush form, about 18 inches high.

Pkt., 10c; ½ lb., 20c; 1 lb., 30c; 5 lbs., \$1.40; 15 lbs., \$3.50.



OF all the Pole Beans, Limas are considered to have the greatest economic value. The culture is the same as for other Pole Beans except that being more tender, the beans are usually planted one to two weeks later. Plant in hills about three feet apart, and one to two inches deep, using five or six beans to each hill, and set a pole firmly in the center. Manure liberally in the hill with well-decomposed fertilizer.

Thin the plants, leaving three in each hill. Many cultivators consider it best, in planting Limas and other flat beans, to place the eye down, claiming in this way that they will germinate more quickly. Lima Beans for early use may be grown in frames and transplanted.

All varieties of Beans, pkt. 10c. All packets are sent postpaid; for larger quantities by mail, see "Postage" 2nd page of cover

McCullough's Extra Large Lima A choice selection of the Large Lima. It produces pods and beans of large size and in great abundance. This variety is without doubt the best for private gardens. The quality is much better than any other

variety, the Beans cooking rich and mealy.

Pkt., 10c; ½ lb., 20c; 1 lb., 35c; 5 lbs., \$1.50; 15 lbs., \$4.00. Early Leviathan Lima. The earliest variety of Pole Lima; produces pods in clusters. A good variety where the season is short.

Pkt., 10c; ½ lb., 20c; 1 lb., 35c; 5 lbs., \$1.50; 15 lbs., \$4.00. King of the Garden Lima. A vigorous grower, bearing profusely. The beans are large and of rich flavor.

Pkt., 10c; ½ lb., 20c; 1 lb., 35c; 5 lbs., \$1.50; 15 lbs., \$4.00.

Seibert's Early Lima. The earliest of all the large Limas. Vine is hardy and vigorous, continues in bearing longer than any other; fine quality.

Pkt., 10c; ½ lb., 20c; 1 lb., 35c; 5 lbs., \$1.50; 15 lbs., \$4.00.

BEANS Continued

Pole or Running Varieties

One pound will plant 200 feet of row-90 to 100 pounds per acre.

THE Pole or Running varieties are tender and should be sown two weeks later than Bush Beans. They succeed best in sandy loam, which should be liberally enriched with manure. Form hills 3 to 4 feet apart; plant 6 to 10 beans in a hill, 2 inches deep, leaving space in center for the pole. When well started, they should be thinned to from 4 to 6 plants in a hill.

All varieties of Beans, pkt., 10c. postpaid; for larger quantities by mail, see "Postage" 2nd page of cover.

Kentucky Wonder, or Old Homestead (Green Pod). An old favorite, with long, fleshy, deeply saddle-backed pods. Very prolific, producing an abundance of fine, stringless, crisp beans until late in the season. One of the best green pole beans, producing pods in clusters, ready for use about 85 days from time of planting.

Pkt.,10c; ½ lb.,20c; 1 lb.,30c; 5 lbs.,\$1.35; 15 lbs.,\$3.50.

Black Kentucky Wonder. This variety produces long pods one-half larger than the brown seeded variety. Pods are round, very fleshy and of good quality. The vines are vigorous, climbing well and very productive, bearing long, light green pods in clusters. This variety is a shy seeder. Pkt., 10c; ½ lb., 20c; 1 lb., 30c; 5 lbs., \$1.35.

White Kentucky Wonder, or Burger's Stringless. This desirable variety is earlier and consequently covers a longer season of productiveness than the brown seeded Kentucky Wonder. Pods are borne in clusters and average six to eight inches in length, entirely stringless, uniformly straight, of a dark green color and of mild, sweet flavor. The dry beans are pure white.

Pkt.,10c; ½ lb.,20c; 1 lb.,30c; 5 lbs.,\$1.35; 15 lbs., \$3.50.

Cut Short, or Corn Hill. One of the best varieties of Corn Beans in use. Can be used as a snap or shell bean. Considered the best Corn Bean for this section.

Pkt.,10c; ½ lb.,20c; 1 lb.,30c; 5 lbs.,\$1.35; 15 lbs.,\$3.50.

Horticultural. (Wren's Egg, or Speckled Cranberry). This old favorite is an excellent Corn Bean, green shell bean or dry bean for winter use.

Pkt.,10c; ½ lb.,20c; 1 lb.,30c; 5 lbs.,\$1.25; 15 lbs.,\$3.00.

Lazy Wife. An excellent late green-podded pole bean. Pods of medium dark green color, thick, very fleshy and entirely stringless. The pods remain green and tender until nearly ripe. Beans are white and excellent as shell beans for winter use.

Pkt.,10c; ½ lb.,20c; 1 lb.,30c; 5 lbs.,\$1.35; 15 lbs.,\$3.50.

Casian. The pods, produced in great abundance, are a rich, dark green color, measuring about ten inches long, rather flat and slightly curved. Fine for use as a snapshort, being entirely stringless when young. If pods are picked before maturing, vines bear till frost. If pods are allowed to mature, they produce a good sized white bear for winter use. bean for winter use.

Pkt.,10c; ½ lb.,20c; 1 lb.,30c; 5 lbs.,\$1.35; 15 lbs., \$3.50.

White Creaseback. A good grower and very productive. Pods 5 to 6 inches long, perfectly round, with a crease in the back. The pods are stringless, fleshy and of good quality.

Pkt..10c; ½ lb.,20c; 1 lb.,30c; 5 lbs.,\$1.25; 15 lbs.,\$3.00.

White Sickle. Somewhat like the Kentucky Wonder, but has a nice white bean when dry and makes an excellent shell bean for winter. Very popular in the South.

Pkt.,10c; ½ lb.,20c; 1 lb.,30c; 5 lbs.,\$1.25; 15 lbs.,\$3.00.

Scarlet Runner. An ornamental climber. Bright scarlet flowers; pods are edible when picked young. Pkt., 10c; ½ lb., 25c; 1 lb., 40c.

Scotia, or Striped Creaseback. A hardy and very productive green-podded cornfield bean. The vines are sturdy and of good climbing habit with small-medium deep green leaves. The pods are long, about 6 inches, very cylindrical or completely rounded, distinctly creasebacked, very feshy and of excellent quality. The color when in condition for use as snaps is light silvery green, becoming tinged with purple as the pods mature. This variety is especially suitable for growing in corn for snaps

for snaps.

Pkt..10c; ½ lb.,20c; 1 lb.,30c; 5 lbs.,\$1.35; 15 lbs.,\$3.50.

Tennessee Wonder, or Egg Harbor. Large green pods, curved, double barreled, tinged with purple and wrinkled, depressed between each of the eight or nine seeds. Considered one of the largest of all cultivated beans. Pkt..10c; ½ lb.,20c; 1 lb.,30c; 5 lbs.,\$1.35. 15 lbs.,\$3;50.



Kentucky Wonder

Ohio Wax Pole. Pods usually 7 inches long, solidly meaty and entirely stringless; commences to bear when scarcely higher than the bush variety, and keeps on producing until killed by frost.
Pkt., 10c; ½ lb., 20c; 1 lb., 35c; 5 lbs., \$1.60.

Golden Cluster Wax. The pods are from 6 to 8 inches long, stringless, very tender and of delicate flavor.

Pkt., 10c; ½ lb., 20c; 1 lb., 35c; 5 lbs., \$1.60.





BRUSSELS SPROUTS

BROCCOLI

"SEEDS ARE DIFFERENT"

Seeds are different from manufactured merchandise, because they are produced by the hand of Nature and not by the hand of man.

BEETS

One ounce will sow 100 feet of drill-12 pounds for an acre.

THE soil which is best suited is that which is rather light and thoroughly enriched with manure. For an early supply sow in spring as soon as the ground becomes fit to work, in drills twelve to sixteen inches apart and one inch deep. Or seed may be sown under glass four weeks sooner, and the young seedlings transplanted to open ground to give an extra

open ground to give an extra early crop.
For main crop, sow the first week in May, and for winter use sow in June.
When the plants have attained three or four leaves, thin out so they may stand five or six inches apart. Keep free from weeds by hand-weeding or hoeing. In October roots may be taken up and stored in the cellar or no its outside like potatoes.



McCullough's "Norwood"

McCullough's both for market and the home garden. The roots are of neat turnip shape, growing three or four inches in diameter, deep through, smooth and entirely free from small rootlets. Flesh deep blood-red, tender, and of rich fiavor. The roots can be used early in the season when only partially grown, being ready for use almost as quickly as the Extra Early sorts and of better quality. It retains its choice quality and freedom from woodiness until the beets have reached their full size. Foliage is small, of a rich bronze color. a rich bronze color.

Pkt., 10c; oz., 15c; ¼ lb., 50c; per lb., \$1.50.

ington. A dark-leaved, early blood variety, closely following Eclipse in maturing, but of darker color and superior quality. An excellent Beet for market gardeners...Pkt.,10c; oz.,15c; ½ lb.,35c; per lb.,\$1.25.

sano. (The Table Sugar Beet). A very early flat variety, tender, juicy; flesh white and rose-colored, very sweet..Pkt.,10c; oz.,15c; ½ lb.,35c; per lb.,\$1.25. A very early flat

Crimson Globe.

mson Globe. A handsome early or main-crop variety, of medium size, almost globe shaped and entirely free from rootlets. Foliage rich bronzy purple. The flesh is blood-red, slightly zoned. Pkt., 10c; oz., 15c; ½ lb., 35c; per lb., \$1.25.

Crosby's Improved Egyptian. An improved strain of the Egyptian Beet, especially recommended as an extra early sort. It is much thicker than the original strain. Pkt., 10c; oz., per lb., \$1.25. oz., 15c; ¼ lb., 35c;

Detroit. Color of skin dark blood-red, flesh bright red, zoned with a lighter shade, very crisp, tender and sweet. Pkt., 10c; oz., 15c; ¼ lb., 35c; per lb., \$1.25.

Early Blood. Flesh dark red, standard round variety w with small top. Pkt., 10c; oz., 15c; ¼ lb., 35c; per lb., \$1.25. Early Wonder. This is a new and distinct extra early Turnip-rooted variety of the finest table quality. The flesh is solid, crisp, sweet, and of a brilliant flery red color. It is perfectly globular in form with smooth skin, a tiny tap root, and very slender leaf stalks.

Pkt., 10c; oz., 15c; ½ lb., 35c; per lb., \$1.25.

pse. One of the best early sorts, with a small tap root and small collar. Flesh dark red, zoned with a lighter shade, sweet, crisp and tender.

Pkt., 10c; oz., 15c; ½ lb., 35c; per lb., \$1.25. Eclipse.

Edmand's Early. Uniform small top, bronzy red; exceedingly tender and sweet; skin blood-red; flesh dark red.. Pkt., 10c; oz., 15c; ¼ lb., 35c; per lb., \$1.25.

Egyptian Extra Early. One of the earliest, of good quality and medium size; a fine forcer; small top. Pkt., 10c; oz., 15c; ¼ lb., 35c; per lb., \$1.25.

Half Long Blood. One of the best for winter use. Roots are only half as long as the Long Blood, but weigh as much on account of their thickness.

Pkt., 10c; oz., 15c; ½ lb., 35c; per lb., \$1.25.

Long Dark Blood. A good late variety for fall and winter use; sweet and tender. Pkt., 10c; oz., 15c; ½ lb., 35c; per lb., \$1.25.

BEETS—Cattle and Sugar

SUGAR BEETS FOR STOCK

One ounce will sow 200 feet of drill—five and one-half pounds for an acre

SUGAR Beets are not as heavy yielders as the Mangels, but are of superior quality, containing a large amount of sugar. They are excellent for feeding cows, improving wonderfully the quantity and quality of the milk.

Vilmorin's Improved. A medium sized white Sugar Beet brought by the most careful selection to the highest perfection, both in shape and color of roots. Greatly esteemed by sugar manufacturers. Pkt., 10c; oz., 15c; ½ lb., 25c; per lb., 75c.

Lane's Imperial. One of the best for field culture; early large and productive.
Pkt., 10c; oz., 15c; ½ lb., 25c; per lb., 75c Giant Half-Sugar Green Top. Longish ovoid; red skin; white flesh; crisp and fine.
Pkt., 10c; oz., 15c; ½ lb., 25c; per lb., 75c.

MANGEL-WURZELS

Five and one-half pounds for an acre.

FATTENING, breeding and milk cattle do equally well on them. About one-fourth of the daily rations should be of roots. Sow in rows 2½ feet apart as soon as the ground can be thoroughly worked. Cover seed about 1½ inches. When 4 inches high, thin to 8 inches apart. ground can 1½ inches. Mammoth Long Red. Roots of large size and excellent quality..Pkt., 10c; oz., 15c; ½ lb., 25c; per lb., 60c.

Tankard. Bright yellow, large, handsome, heavy cropper.
Pkt., 10c; oz., 15c; 1/2 lb., 25c; per lb., 60c

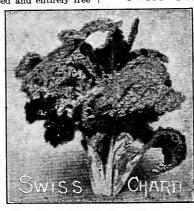
Swiss Chard or Spinach Beet

Swiss Chard or Silver Beet. This variety of Beet does not make a large root, and is grown only for its leaves, which make splendid "greens" and the broad, white stalks or midribs are cooked and served like Asparagus.

Pkt., 10c; oz., 15c; 1/4 lb., 30c per lb., \$1.00.

This is a decided Giant Lucullus. nt Lucullus. This is a decided improvement over the common variety. The plants grow from 2 to 2½ feet tall and when fully developed produce about a dozen creamy white curled leaves, which are carried on broad thick stalks, about 12 inches long. The learly portion of the plant should be cooked like Spinach and the stalks like Asparagus. Asparagus..

Pkt., 10c; oz., 15c; ½ lb., 50c; per lb., \$1.50.



CABBAGE

Sow one ounce for 2,500 to 2,800 plants; five and one-half ounces for one acre.

FOR plants of the earliest sorts, sow seed in January or February under glass, and prick out in flats or frames about 2 inches apart each way. Transplant to open ground as soon in spring as the land can be properly prepared. A rich, warm, fibrous loam is best. Have the plants in the rows 20 to 24 inches apart, and rows at least 2 feet apart. Give thorough cultivation and irrigate in dry weather if practicable. Protect from the ravages of cutworm, maggot and green worm. A little nitrate of soda applied around the plant is of A new nurse or soda appired around the plant is of great benefit. For late Cabbage plants, sow seed in drills in open ground during April and May, and transplant in June and July, giving the plants more room than allowed for earliest Cabbages. Dusting with Slug Shot, tobacco dust, insect powder, etc., or splashing with hot soapsuds, especially Fish Oil Soap solution, are good and safe remedies for some of the insect pests attacking plants of the Cabbage.

McCullough's Early Louisville Drumhead peer of all other varieties throughout this section. It is highly esteemed by the market gardeners, and it will stand hot weather better than any other sort; will stand the entire summer without bursting; in fact, we produced heads that weighed 18 pounds on September 1, having been planted with Jersey Wakefield, which was long unfit for use. Our Louisville forms large, solid heads, and is the earliest large-heading variety, while, if planted later, it makes excellent heads for winter. The quality is very fine, and is remarkable for its certainty to head. For winter use, sow later in the season. We have received expressions of unanimous praise from all parts of the country, and could fill many pages of our catalog with testimonials.....Pkt., 10c; oz., 30c; ½ lb., \$1.00.

NOTE:—McCullough's "Louisville Drumhead" Cabbage is so well known and so much sought after that many firms are offering cheap stocks. We have tested many of these and find some entirely untrue and others of inferior strains. Be sure to get our highly selected growing two direct from us selected, genuine type direct from us.

McCullough's Early Market. A new, early, round head Cabbage. It will produce double the crop of any other early variety; always extremely solid and fine ribbed. It is very dwarf and compact, allowing of close planting. Heads fine, ball-shaped, and with few outside leaves. Size ideal for marketing.

Pkt., 10c; oz., 75c; ½ lb., \$2.50.

Golden Acre. This is a new, early, round-headed Cabbage which closely resembles Copenhagen Market in type. As its name implies, it is a money-maker. It is 8 to 10 days earlier than Copenhagen Market but is smaller and can be planted closer. Because of its earliness and fine quality it commands a higher price than any round-headed Cabbage.

Pkt., 10c; oz., 75c; ¼ lb., \$2.50.

ly Jersey Wakefield. One of the best extra early varieties in cultivation. The heads are pyramidal in shape, having a blunted or rounded peak. We believe our selected stock has no equal.

Pkt., 10c; oz., 30c; ¼ lb., \$1.00.

Copenhagen Market. The earliest large, round headed sort ripening early and uniform. It has few outer leaves and it grows close to the ground on a short stem. Pkt., 10c; oz., 40c; ½ lb., \$1.25.

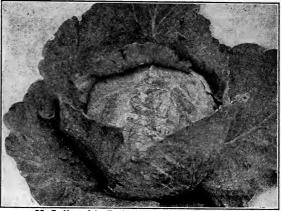
Charleston, or Large Wakefield. Has all the characteristics of the Early Jersey Wakefield, but of greater size, and is only a few days later.

Pkt., 10c; oz., 30c; ¼ lb., \$1.00.

Early Summer. A second early with large, solid, flattish heads, coming in a few days later than the Wakefield; a sure header......Pkt., 10c; oz., 30c; 1/4 lb., \$1.00.

Early Dwarf Flat Dutch. One of the best second earlies. Heads are large, solid and nearly flat on top. Pkt., 10c; oz., 30c; ¼ lb., \$1.00.

Succession.



McCullough's Early Louisville Drumheau

All-Seasons. (Vandergaw.) Large, hard, solid and slightly flattened heads. As good for autumn or winter as for early summer.

Pkt., 10c; oz., 30c; ½ lb., \$1.00.

Surehead. A good strain of late Flat Dutch. Heads grow large and are of good texture. It is also a good keeping variety......Pkt., 10c; oz., 30c; ¼ lb., \$1.00.

McCullough's Premium market; has no superior.

Late Flat Dutch Heads large, round, solid, broad and flat on top.

They open white and crisp, are tender and well-flavored.

The best variety for keeping. Our stock has been carefully selected for several years. No better strain on the market. Pkt., 10c; oz., 25c; 1/4 lb., 85c.

Large Late Drumhead. A favorite winter variety. The heads grow to very large size and heavy weight. Solid heads grow to very large size and heavy weight. Solid and of good quality...Pkt., 10c; oz., 25c; 1/4 lb., 85c.

nish Ballhead. (Danish Grown). Heads of good marketable size, averaging about 8 pounds, nearly round, solid and superior quality. Pkt., 10c; oz., 40c; 1/4 lb., \$1.25.

Danish "Roundhead." It is slightly larger and produces more weight to the acre than Ballhead. The heads are produced about ten days earlier, are splendid keepers and bring the highest prices on market in winter. Pkt., 10c; oz., 40c; ½ lb., \$1.25.

RED CABBAGE

Mammoth Rock Red. The largest and most solid of the red varieties; a sure heading sort and tender.
Pkt., 10c; oz., 30c; ½ lb., \$1.00.

SAVOY CABBAGE

THEY are particularly adapted to private use where quality, rather than quantity is desired. Grown in fall and allowed to be touched by frost, it is one of the most delicious of all vegetables.

American Drumhead Sayoy. Heads large and very finely curled; short stalk and compact grover; an excellent keeper......Pkt., 10c; oz., 30c; ½ lb., \$1.00.

PE-TSAI, CHINESE OR CELERY CABBAGE

THE Seed we offer is the true variety which has been grown in China for many years. This new vegetable is a species of Cabbage with a fine delicate flavor and resembles a stalk of Celery more than a head of Cabbage. It is as tender as Head Lettuce and is rapidly coming into general use for salads or cold slaw. Can also be eaten raw or may be cooked. The many uses to which it can be put as a "high toned vegetable" are bound to make it popular with the public as well as the market gardener. This delicious vegetable may be grown in any soil that will grow good Cabbage, but to attain perfection should be grown in cool, moist and very rich soil.

Seed should be sown about the first of August in rows 24 to 36 inches apart, thinning to 15 inches apart in the rows.

If weather is warm at time of heading tie up like Endive and keep well watered

As this variety will not stand frost it should be stored

CARROTS

One ounce will sow 200 feet of drill-three and one-half pounds for an acre.

light sandy loam, well-tilled and manured A light sandy loam, well-tilled and manured the previous year, best suits the Carrot. For early crop sow as early as the ground can be worked, in drills 10 inches apart, and thin to 5 inches apart. The Early Market, owing to its extreme earliness, is used for hot-bed culture. The late sorts; long and half-long varieties (main crop), sow from middle of May until first of July in drills 12 to 14 inches apart. Thin out to 6 and 7 inches in row. Keep the hoe at work. Carrot seed is slow to germinate.

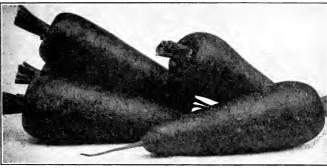
Carrot Seed grown for stock requires one-half ounce for 200 feet of drill, one and one-half pounds for an acre.

ly Market, Stump-rooted. A very choice strain, tender, fine-grained flesh. An enormous producer, handsome, uniform stumped roots. Considered by many to be the best table Carrot, because of its quality and shape; free from core and of a deep golden yellow color. Can be sown thick, and consequently well adapted for frame withing.

relative. A most excellent forcer. Pkt., 10c; oz., 20c; ½ lb., 60c. y Scarlet Horn. An early red summer variety; fine grained and good flavor. Pkt., 10c; oz., 15c; ½ lb., 50c. Early Scarlet Horn.

grained and good navor. Pkt., 10c; 0z., 15c; ½ 1b., 3oc.

Chantenay. It is about 6 inches long, thick through and
decidedly stump-rooted. In size it is between the
Oxheart and Danvers. The flesh is a deep orange red,
fine-grained and of a splendid flavor. It is very early
and always produces smooth shapely roots. Its fine
appearance finds for it a ready market; its splendid
table qualities keep it in demand. Our strain of seed
is unsurpassed.....Pkt., 10c; 0z., 15c; ½ lb., 50c.
Danvers. A cylindrical-shaped Carrot of good size and
stump-rooted rich dark orange color, grows to a large



Chantenav

teart or Guerande. Intermediate length; is fully 3 to 5 inches in diameter; quality extra good. Some sorts require digging, but the Oxheart can be easily pulled. It is especially adapted to shallow soils, where the longer sorts would not thrive as well. Oxheart or Guerande.

Pkt., 10c; oz., 15c; 1/4 lb., 50c.

McCullough's A large, handsome main-crop variety. It is the connecting link between half-long and long Carrots, with a yielding capacity in deep soils equal to any of the longs. The root, 10 or 12 inches in length, is very broad at the neck, 2 to 3 inches through, and tapers evenly to the small tap-root. It grows smoothly and uniformly and combines with its other merits rich reddish-orange fiesh, tender, sweet and entirely free from woody coarseness even at maturity.

Pkt., 10c; oz., 15c; 1/4 lb., 50c. Nantes Half-Long Scarlet. A stump-rooted variety, having little or no core. Flesh red and of fine flavor.

Pkt., 10c; oz., 15c; 1/4 lb., 50c. Improved Long Orange. A standard late variety; deep orange color. It is of excellent table quality and is highly nutritious for stock.

Pkt., 10c; oz., 15c; 1/4 lb., 40c.

CAULIFLOWER

One ounce of seed will produce about 2,200 plants.

FOR early use, sow in hotbeds in January and February. When plants are large enough, transplant three inches apart in boxes or other hotbeds until time to plant out. If hardened off they are seldom injured by planting out as early as the ground can be worked, 2½ feet apart each way. When practicable, seed may be sown in rich soil from the middle of September to middle of October, and transplanted in frames, protect during severe weather and give light and air on mild days. The early varieties should be brought to maturity before summer heat sets in. The late sorts mature in the autumn and are cultivated same as winter Cabbages.



McCullough's the best for all purposes. It heads where others fail. Year after year this has become

more popular, until leading market gardeners now grow it entirely, having discarded all the older varieties, as they find our strain of Erfurt to be the surest-heading. On account of its dwarf and compact habit, the plants may be set out 20 to 22 inches each way, so that from 12,000 to 14,000 can be planted on an acre. For pickling it is the standard variety. The compact and solid texture of the snow-white heads, combined with delicious flavor, surpass all others.

Pkt., 25c; ½ oz., \$1.00.

y Snowball. An extremely early dwarf variety, producing magnificent white heads, of fine quality. Well adapted to hot-bed culture. Early Snowball.

Pkt., 20c; 1/4 oz., 75c; oz., \$2.50. Danish Giant. A large heavy sort, matur-ing soon after Dwarf Erfurt. It is with-out exception the best and surest head-ing of all for summer use. Pkt., 20c; 1/4 oz., 75c.

y Paris. Heads large, white, compact and solid; tender and delicious.

Pkt., 10c; ¼ oz., 30c; oz., \$1.00. Early Paris.

Autumn Giant. One of the finest late va-rieties, of robust habit, heads large, compact and thoroughly protected by

leaves. Pkt., 10c; ¼ oz., 30c; oz., \$1.00.

Special price to market gardeners.

CELERY

One ounce will produce about 25,000 plants

To grow early Celery, sow the seed late in March in a hotbed or box: and for later crops, as soon as the weather becomes warm, sow in the open ground, cover lightly, or better still, roll or press it in. Shade the young plants for a week or ten days, and do not let the soil dry out. The tops may be shorn off once or twice before planting, so as to insure "stocky" plants, which will suffer less on being transplanted. When from four to six inches high, transplant in broad, shallow trenches, or on the level ground, setting the dwarf sorts into rows three feet apart, and the tall varieties four feet apart and six inches apart in the rows. The soil should be light, highly manured, partially shaded and moist, or near water, as the plants must be freely watered in dry weather, but it should not be put directly on them. Earthing up checks growth and should not begin until quite well grown, then earth up gradually, keeping the leaf stalks close together, so that the soil may not fall into the center of the plant, but never earth up in wet weather, nor when dew is on them. That intended for winter and spring use needs little banking; when stored for winter it will naturally blanch beautifully white. white.

McCullough's Paris
Golden Yellow

Celery for a number of years and it is pronounced by one and all the finest strain they have ever seen. The color is a rich golden yellow, stalks are very solid and tender, flavor is delicious, has large heart, grows medium height, and is without doubt the best early Celery on the market. The demand for our strain of this variety is increasing every year and we advise our customers to order early, as supply is limited. We are confident you can not obtain anywhere a strain of Paris Golden Yellow Celery superior to our own particular selected stock....Pkt., 10c; oz., \$1.00.

Golden Plume. This is a selected strain of Golden Self-Blanching, having a beautiful golden color and that rich, nutty flavor so much desired by lovers of fine Celery. It resists blight and rust to a remarkable degree, matures early, and keeps a long time. The Golden Plume is a good shipping sort. It grows to large size and of fine proportions. A very attractive sort, hence an easy one to sell. **Pkt., 10c; oz., \$1.50.

Golden Self-Blanching. An early, desirable sort, requiring but little labor to blanch. The heart is a rich, golden yellow, with light, yellowish-green outer leaves.

Pkt., 10c: oz., 40c: ½ lb., \$1.50.

te Plume. Is unsurpassed for fall and early winter use, requiring very little earthing up to blanch it.
Pkt., 10c: oz., 30c; ¼ lb., \$1.00.

Easy Blanching. Stalks thick, brittle and excellent flavor. Adapted to early use as well as storing for winter. Those who have not been successful with other sorts, should give this a trial.

Pkt., 10c; oz., 30c; ¼ lb.. \$1.00.

Witloof Chicory



Giant Pascal. A superior keeping sort. The stalks are very large, thick, solid, crisp, and of rich nutty flavor. It blanches very easily and quickly, and retains its freshness along time. Pkt., 10c; oz., 25c; ½ lb., 75c. Giant White Solid. The best of the large growing sorts. This variety is suitable for Southern sections of the country, as it grows freely in a hot or dry atmosphere. Pkt., 10c; oz., 25c; ½ lb., 75c. Snow White. A pure white, self-blanching variety. Vigorous growth, ease of blanching, size, richness of flavor, crispness and purity, make it an ideal Celery. Pkt., 10c; oz., 30c; ½ lb., \$1.00. Triumph. The best late Celery. A strong and vigorous grower, with very large but crisp, brittle, tender and fine flavored stalks...Pkt., 10c; oz., 25c; ½ lb., 75c.

Celeriac, Turnip Rooted Celery

Sow early in spring. Transplant in May into rich, mellow soil in rows eighteen inches apart and six inches in the row. Grown mostly for its bulbous root.

Large Erfurt. When sliced, with vinegar and oil, makes a delicious salad....Pkt., 10c; oz., 25c; ½ lb., 76c.

CHICORY

CHICORY

Large Rooted or Coffee. Grown for the large, thick roots, which are dried, roasted and ground as a substitute for Coffee. Soil should be light, rich and deeply worked. Cultivation the same as carrots...Pkt., 10c; oz., 25c. Witloof Chicory, or French Endive. Seed should be sown in the open ground not later than June in drills twelve to eighteen inches apart, thinning plants so they will stand about three inches apart. The plant forms long, parsnip-shaped roots, which should be lifted in the fall, and after cutting off the leaves store in soil in a cool place until wanted for forcing. To force, plant closely in trenches deep enough to permit covering the roots with soil 8 inches deep. If quicker growth is desired mulch with manure 2 feet deep. Requires four to five weeks to force. The blanched head is the edible portion and should be cut with a portion of the neck attached to it. The principal use of Witloof is as a winter salad, and it is most delicious served with French dressing and eaten like Cos Lettuce.

Pkt., 10c; oz., 25c.

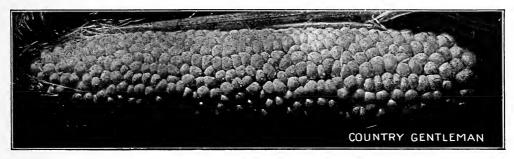
CHIVES

CORN, Sweet or Sugar

One pound will plant 200 hills—10 to 12 pounds per

THE Sweet or Sugar varieties, being liable to rot in cold or wet ground, should not be planted before May or until the ground has become warm, and for a succession continue planting every two weeks until the middle of July, in rich, well manured ground, in hills 3 feet apart each way, covering about half an inch, and then thin out to 3 plants to a hill, or plant in rows 4 feet apart, and to stand 8 inches apart in the rows.

All packets are sent postpaid; for larger quantities by mail see "Postage" 2nd page of cover.



McCullough's Cincinnati Market or Club Zig-Zag Evergreen

This new riety which origi-nated in this market and was

introduced by us, has become the best seller on the Cincinnati market. A late Zig-Zag Evergreen Corn, the ear ordinarily being twice the size in diameter of any other sort, while in sweetness and flavor it cannot be excelled.

Pkt.,10c; ½lb.,15c; 1 lb.,25c; 5 lbs.,\$1.15; 15 lbs.,\$3.15.

- ha. The earliest sweet corn. Matures a week to ten days ahead of Mammoth White Cory. The ears average six to seven inches long, are uniformly eight rowed. Fully equal in quality to Mammoth White Cory with skin a trifle more tender. The stalks are very uniform in height averaging about four feet. Ears are set low and close to the stalks. For the market grower who reaps an extra profit by getting his produce on the market ahead of his competitors this will be a moneymaker; for the home garden it, will produce desirable maker; for the home garden it will produce desirable ears for the table a week ahead of the next earliest Pkt.,10c; ½lb.,20c; 1 lb.,30c; 5 lbs.,\$1.40; 15 lbs.,\$3.75.
- mo. The best extra early variety. It can be planted early, as the young plants will withstand slight frosts. The stalks are strong and vigorous, growing about 5 to the planted by the stalks are strong and vigorous, growing about 5 The status are strong and vigorous, growing about 5 feet in height, bearing one or two fine ears to a stalk. The ears are large for so early a variety. The grains are of medium size, well filled to each end of the ear, and of a fine, sweet flavor.

 Pkt.,10c; ½lb.,15c; 1 lb.,25c; 5 lbs.,\$1.15; 15 lbs.,\$3.15.

ly Sheffield. Very early variety. The stalks are strong and vigorous, bearing one or two fine ears to a stalk. The ears are large and entirely free from smut. The grains are of medium size, 10 or 12 rowed, well filled to each end of the ear; juicy, and of a fine sweet flavor. Pkt.,10c; ½lb.,15c; l lb.,25c; 5 lbs.,\$1.15; l5 lbs.,\$3.15. Early Sheffield.

Kendel's Early Giant. Very early, fit for use 60 days from planting. Ears large, 8 to 10 inches in length, twelve rows to a cob. Kernels pure white, sweet and

tender. Pkt..10c; ½lb..15c; 1 lb..25c; 5 lbs.,\$1.15; 15 lbs.,\$3.15.

den Bantam. It is not only the sweetest, but also one of the hardiest. The ears are from 6 to 7 inches long, eight rowed, filled with broad, sweet, golden yellow kernels of a delightful flavor. It may be planted with perfect safety ten days earlier than other Sweet Corns. One of the best sorts for successive plantings. Pkt.,10c; ½lb.,15c; 1 lb.,25c; 5 lbs.,\$1.15; 15 lbs.,\$3.15. Golden Bantam.

Golden Giant. It excels all the other early varieties of corn in size, productiveness and quality; and all the late varieties in quality and early maturity while equaling them in size.

Pkt.,10c; ½2b.,15c; 1 lb.,25c; 5 lbs.,\$1.15; 15 lbs.,\$3.15.

Whipple's Early. Of the narrow-grained Evergreen type, but ready for use much earlier. Ears 8 to 9 inches long, 16 to 18 rows of pearly white grains. The chief distinction of this variety is that it is by far the earliest of the narrow-grained Evergreen types and has a larger sugar content. sugar content.
Pkt.,10c; ½lb.,15c; 1 lb.,25c; 5 lbs.,\$1.15; 15 lbs.,\$3.15.

Howling Mob. A large, medium early white Sweet Corn.
Ears are 7 to 8 inches long, with 12 to 14 rows of pure white grains.
A splendid sort for the Market Gardener as well as for home use.
Pkt.,10c; ½lb.,15c; 1 lb.,25c; 5 lbs.,\$1.15; 15 lbs.,\$3.15.

Early Minnesota. Very early, ears of fair size and good uality quanty. Pkt.,10c; ½lb.,15c; 1 lb.,25c; 5 lbs.,\$1.15; 15 lbs.,\$3.15.

Early Evergreen. An early strain of Evergreen of great value. This variety resembles the Stowell's Evergreen, but is ready for use much earlier, and remains in good condition equally as long. The ears grow to a good size, usually about 7 inches long, and contain from 16 to 18 rows of deep, sweet grains

Pkt.,10c; ½lb.,15c; 1 lb.,25c; 5 lbs.,\$1.15; 15 lbs.,\$3.15.

Country Gentleman. One of the richest flavored of all the late varieties. As a table Corn this variety stands unrivaled, and without doubt is the most luscious of all varieties of Sweet Corn. The plump, pearly-white kernels are of great depth. We have selected this sort for many years and it comes as true to type as any we have ever seen. Ears average 9 inches long by 2 inches in diameter.

Pkt.,10c; ½2lb.,15c; 1 lb.,25c; 5 lbs.,\$1.15; 15 lbs.,\$3.15.

Stowell's Evergreen. The standard variety, both for home use and market, and is the general favorite. The ears are of a large size, grains deep, exceptionally tender and sugary, and has the advantage of remaining longer in the green state than any other.

Pkt.,10c; ½lb.,15c; 1 lb.,25c; 5 lbs.,\$1.15; 15 lbs.,\$3.15.

Narrow Grain Evergreen. Similar in all respects to Stowell's Evergreen, but has very narrow grains. Pkt.,10c; ½lb.,15c; 1 lb.,25c; 5 lbs.,\$1.15; 15 lbs.,\$3.15.

Zig-Zag Evergreen. This is one of the sweetest and best late Sweet Corns. The ears are as large as those of the Evergreen, but the kernels are placed irregularly or zig-zag upon the cob, which is always an indication of great sweetness.

Pkt.,10c; ½lb.,15c; 1 lb.,25c; 5 lbs.,\$1.15; 15 lbs.,\$3.15.

Late Mammoth. A late variety, producing ears of very large size and fine flavor. Pkt.,10c; ½lb.,15c; 1 lb.,25c; 5 lbs.,\$1.15; 15 lbs.,\$3.15.

Black Mexican. Black-grained variety; sweet, tender; must be picked young to avoid a black appearance when cooked. Pkt.,10c; ½lb.,15c; 1 lb.,25c; 5 lbs.,\$1.15; 15 lbs.,\$3.15.

GARDEN CORN

- ms' Extra Early. The hardiest and earliest variety for table use, but not a Sugar Corn; can be planted earlier than any other corn.

 Pkt., 10c; ½ lb., 15c; 1 lb., 20c; 5 lbs., 85c; 15 lbs., \$2.25.
- Adams' Early. While not a Sugar Corn, is a tender white corn for the table; can be planted earlier and will be ready in sixty days.

 Pkt.10c; ½1b.15c; 11b.20c; 51bs.85c; 151bs.\$2.25.
- Adams' Improved. A larger variety; recommended for extreme early and late planting.
 Pkt.,10c; ½ lb.,15c; 1 lb.,20c; 5 lbs.,85c; 15 lbs.,\$2.25

COLLARDS

CUCUMBERS

FOR very early Cucumbers, sow April 1st, in a hotbed upon pieces of sod (grass side down), so that they can be readily transplanted to the open ground, in rich soil. when danger of frost is over, or protect by handglasses. For early use, plant, if the weather has become settled and warm, in hills 4 to 6 feet apart each way; thin out to four of the strongest plants to each hill, after all danger from insects is over. They succeed best in a warm, moist, rich, loamy soil. Continue planting at intervals for a succession. The Cucumbers should be gathered when large enough for use, whether required or not; if left to ripen, it destroys their productiveness. For pickles, plant from June until the middle of July. The yellowstriped cucumber or squash beetle is the most serious insect enemy of this crop.

Bordeaux Arsenate of Lead Mixture is by far the best remedy yet discovered. Dilute it with water, 3 ounces to the

gallon, and spray it on the vines when in danger of the beetle or blight.

McCullough's Special

An excellent Cucumber for both forcing and outdoor use. The fruit grows 11 to 15 inches

a dark glossy green color, which they keep until ripe.
In quality it is very tender, brittle and of fine flavor.
A vigorous grower, withstanding blight better A vigorous grower, than other long sorts.

Pkt., 10c; oz., 15c; 1/4 lb., 40c; per lb., \$1.50.

agfellow. The vines are exceptionally healthy and productive and fairly early. The fruits will average 12 to 14 inches in length by 2½ inches in diameter and are very symmetrical. The color is all that could be desired and this variety will retain its dark-green color when shipped to distant markets. An ideal type for the private garden. This variety, unlike most other sorts, succeeds equally well in the garden or the greenhouse. Longfellow.

Pkt., 10c; oz., 25c; ¼ lb., 75c; per lb., \$2.50.

Davis Perfect. Splendidly adapted for growing either under glass or in the garden. In color, a dark glossy green; shape, slim and symmetrical, with an average length of 10 to 12 inches. They are as early as the earliest strain of White Spine.

Pkt., 10c; oz., 15c; ½ lb., 40c; per lb., \$1.25.

and very productive; fruit grows 9 inches long, slightly tapering, flesh, white, firm and crisp with very few seeds; color dark green. Quality is excellent, either for the table. or pickling.

Pkt., 10c; oz., 15c; ½ lb., 40c; per lb., \$1.25. Early Fortune.

Improved White Spine. The favorite market variety. Largely grown South for Northern Markets, early in the season. The fruit grows from 7 to 10 inches long, is quite smooth, of a deep green color and full at both ends. Pkt., 10c; oz., 15c; ½ lb., 40c; per lb., \$1.25.

Jersey Pickle. As a pickling variety is unsurpassed. Its characteristics are its uniform growth and its immense productiveness.

Pkt., 10c; oz., 15c; 1/4 lb., 40c: per lb., \$1.25.

Early Cluster. A much esteemed early various, clusters; is extremely productive.

Pkt.. 10c; oz., 15c; ½ lb., 40c; per lb., \$1.25.

Early Frame. A Medium size. A good variety for pickling and table. Pkt., 10c; oz., 15c; 1/4 lb., 40c; per lb., \$1.25.



Ohio White Spine

Nichol's Medium Green. One of the best for pickling, and excellent for forcing or slicing. Always straight and smooth. In length it is between White Spine and Long Green.

Pkt., 10c; oz., 15c; 1/4 lb., 40c; per lb., \$1.25.

Long Green Improved. A standard late sort, fruit 12 to 14 inches long, slender, more or less warted, tapering towards the stem end; Color dark green, flesh white and firm. Excellent for table and makes a hard. brittle pickle. Extra selected stock.

Pkt., 10c; oz., 20c; 1/4 lb., 60c; per lb., \$2.00.

Long Green. A standard late sort, crisp and tender, very prolific, excellent for the table and makes a hard, brittle pickle. Pkt. 10c; oz. 15c: ¼ lb.. 40c; per lb.. \$1.25.

Japanese Climbing. It is suitable for growing either in frames or in the open ground. It is very early and exceedingly productive. The fruit is excellent either for the table or pickling....Pkt., 10c; oz., 15c; ½ lb., 50c.

rkin. A very small prickly variety, used exclusively for pickling, for which purpose they should be gathered while young and tender. Gherkin.

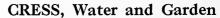
Pkt., 10c; oz., 15c; 1/4 lb., 50c.

ENGLISH FORCING CUCUMBER

The best for forcing, attaining a length of twenty to thirty inches. They can be grown in hotbeds, where the temperature does not fall below 65 degrees at night.

Duke of Edinburg. Very large and long, dull green, quite smooth; packet of 10 seeds......25c.

Telegraph.



SOW thickly in shallow drills early in the spring, and at intervals throughout the season for a succession, as it soon runs to seed. Water Cress requires a stream of running water, ditch, or pond, in which it will grow without care, except at first keeping weeds from interfering with it.

Extra Curled or Peppergrass. Fine flavor, and the best sort for dry soil.
Pkt., 10c; oz., 15c; ½ lb., 40c.

urt Water Cress. A most desirable and appetizing salad, thriving best in shallow water on the edge of streams. Pkt., 10c; ½ oz., 30c; oz., 50c. Erfurt Water Cress.



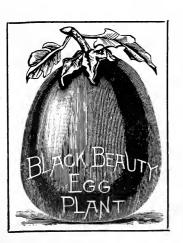
One ounce of seed will produce about 2,000 plants.

SEED is of slow germination and requires a moderate amount of heat. Should be started in hothed and not actually a started in hothed actually actually a started in hothed actually actually a started in hothed actually a be started in hotbeds and not checked after starting to grow. When 2 or 3 inches high they should be potted in 3-inch pots and not set out in the open until nights are warm. Plant about 3 feet apart and keep well watered.

Black Beauty. This new variety is an excellent market sort. It is about the same size and shape as the New York Improved, except a little fuller at the top; is a few days earlier and a heavier yielder. Its color is a rich purplish black, which it retains even after becoming ripe.

Pkt., 10c; oz., 40c; ¼ lb., \$1.50.

New York_Improved. A leading market variety.
Pkt., 10c; oz., 40c; 1/2 lb., \$1.50.



ENDIVE

One ounce of seed to 300 feet of row.

ONE of the best and most wholesome salads for fall and winter use. Sow in shallow drills in April for early use, or for late use in June or July. When 2 or 3 inches high, transplant into good ground, or thin out to one foot apart. When nearly full grown, they must be blanched. This is done by gathering the leaves together, and tying with yarn or bass, to exclude the light and air from the inner leaves, which must be done when quite dry or they will rot. will rot.

Broad-Leaved Batavian. Leaves broad, light green, nearly plain; used in stews and soups.

Pkt., 10c; oz., 15c; ½ lb., 50c.

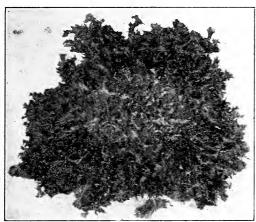
Green Curled. Very hardy, crisp and tender. Pkt., 10c; oz., 15c; ¼ lb., 50c.

Moss Curled. It is excellent for winter use Pkt., 10c; oz., 15c; ¼ lb., 50c.

White Curled. Coarser than Green Curled, but the midrib is yellow and the leaves frequently almost white.

Pkt., 10c; oz., 15c; ¼ lb., 50c.

French Endive. (Witloof Chicory.) See Chicory.



Endive

GARLIC

PLANT same as Onions in rows 8 to 12 inches apart; set bulbs 4 inches apart in the rows, covering 2 inches

HERB SEEDS

Sow early in April or May in a sheltered, well-prepared spot in the open ground, either broadcast or in shallow drills about 7 inches apart. Thin out the plants thus raised and keep clear from weeds.

Anise, Biennial Pkt., 10c; oz., 20c. Balm, Sweet. Perennial, 1 foot. Pkt. 10c; oz., 25c.

Anise. Biennial Pkt., 10c; oz., 20c.
Balm, Sweet. Perennial, 1 foot.
Pkt., 10c; oz., 25c.
Basil, Sweet. Annual, 1 foot.
Pkt., 10c; oz., 25c.
Caraway. Perennial, 2 feet.

Pkt., 10c; oz., 20c. Dill. Biennial, 3 feet.

Dill. Biennial, 3 feet.

Fennel, Sweet. Pkt., 10c; oz., 20c.

Fennel, Sweet. Perennial, 6 feet.

Pkt., 10c; oz., 20c.

Pkt., 10c; oz., 25c.

Hyssop. Perennial, 2 feet.

Pkt., 10c; oz., 25c.

Lavender. Perennial, 2 feet.

Pkt., 10c; oz., 40c.

Rosemary. Perennial, 4 feet.

Pkt., 10c; oz., 40c.

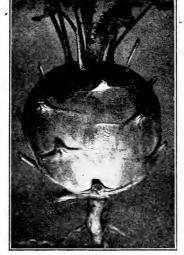
Saffron. Annual, 3 feet.

Pkt., 10c; oz., 25c.

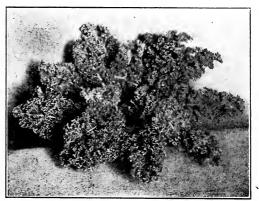
Sage. Annual, 1 foot.

Sage. Annual, 1 foot.

Sage. Annual, I 100t. Pkt., 10c; oz., 40c. Summer Savory. Pkt., 10c; oz., 40c. Sweet Marjoram.Pkt., 10c; oz., 40c. Thyme. Annual, 1 foot. Pkt., 10c; oz., 40c.



Kohl-Rapi



Kale or Borecole

KALE OR BORECOLE

One ounce to 500 feet of row-4 pounds to an acre.

THE Kales are more hardy than Cabbage, make excellent greens for winter and spring use, and are improved by frost. Sow from May to June, and cultivate the same as Cabbage. For early spring use, sow in September, and protect during the winter.

A beautiful curled and crimped variety of strong vigorous habit, perfectly hardy, bright green color and very attractive in appearance, and a bright green color. Norwood Dwarf Curled. A beautiful curled and crimped sort, of strong, vigorous habit, attractive in appearance and a bright green color. It is superior to all other sorts, and is undoubtedly the best for private gardens. It rarely exceeds 12 inches in height, but spreads out under good cultivation to 2 feet in diameter.

Pkt., 10c; oz., 15c; ½ lb., 45c; per lb., \$1.50.

Dwarf Curled Siberian. Leaves yellowish-green, finely curled. Sow in September for early winter and spring use..... Pkt., 10c; oz., 15c; ½ lb., 30c; per lb., \$5c.

Tall Scotch. Leaves green. beautifully curled and wrinkled—grows about 2 feet in height; hardy, being improved by frost.

Pkt., 10c; oz., 15c; ½ lb., 45c; per lb., \$1.50.

KOHL-RABI (Turnip Rooted Cabbage)

One ounce of seed to 400 feet of row.

FOR an early crop, start in a hotbed and treat the same as early cabbage. May also be sown as soon as the ground can be worked in spring. For winter use, sow in the middle of June.

The edible part is the bulb, which grows on a stalk a four inches above the ground.

few inches above the ground.

Early White Vienna. The flesh is white and tender. Pkt., 10c; oz., 30c; ½ lb., 75c.

Early Purple Vienna. Differs from the above in color. Pkt., 10c; oz., 30c; ½ lb., 75c.

LEEK

Sow early in April, in drills one foot apart, one inch deep. When the plants are six to eight inches high, transplant in a deep, rich soil in rows twelve inches apart and six inches in the rows, as deep as possible, so that the neck may be covered and blanched. Draw the earth to them as they grow. The seed may also be sown in September, and the young plants transplanted in the spring.

far the best variety.
a good size and is uniform.
Pkt., 10c; oz., 20c; ½ lb., 65c.
London Flag. An old and popular sort; one of the hardiest; best for winter use.
Pkt., 10c; oz., 20c; ½ lb., 65c.

Large Musselburgh. Of enormous size: leaves large and broad; very mild, pleasant flavor. Pkt., 10c; oz., 20c; ½ lb., 65c.

LETTUCE

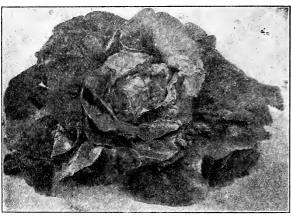
One ounce will produce about 5,000 plants.

S OW the seed in hotbeds or flats during February or early March, prick the young seedlines out in flats or sold flats. Ow the seed in notbeds of nats during reording or early wardin, prick the young seedlings out in flats or cold frame 4 inches apart each way, and in spring, transplant the well-hardened plants in rows a foot apart, allowing 8 to 12 inches space between the plants in the row. For succession, sow seed thinly in open ground, and thin the plants to 5 or more inches apart. Sow for succession every few weeks until fall.

Head Varieties

Iceberg. A large, late, crisp Cabbage-heading variety; heads firm and hard, leaves broad and light green in color, with faint brown tracing on the borders. Quality good.

Pkt., 10c; oz., 20c; ¼ lb., 50c.



Big Boston

Curled Varieties

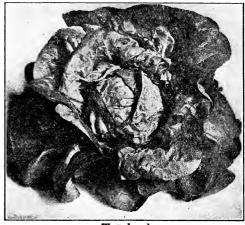
Grand Rapids. This is probably the best of the loose-leaved varieties. It never forms a head, but produces an abundant crop of pale green leaves, slightly but closely crumpled, which, even when old, retain their characteristic tenderness and brittle character. We strongly urge those who cannot succeed in getting lettuce to head to grow Grand Rapids.

Pkt., 10c; oz., 20c; ½ lb., 50c.

Black Seeded Simpson. One of the most popular sorts. It forms large, loose leaves of ideal color; the leaves are large, thin, very tender and of very good quality. It is one of the best sorts for use under glass as well as for early outdoor planting.

"PROFIT McCULLOUGH'S SHARING BACK YARD" COLLECTION 30 (Regular Size) Packets of Vegetable Seeds. \$2.00.

Illustrated on 4th page of cover.



Wayahead

Boston. Heads solid with broad leaves; the best for outdoor or for forcing. Solor light green. We have made a specialty of this variety and have a stock that can not be surpassed.

Pkt., 10c; oz., 20c; ½ lb., 50c. Big Boston.

y King. An early, fine variety for spring and fall use in the open ground, also for growing in cold frames during the winter months. The heads are 6 to 7 inches in diameter, with light green outer leaves. The inner leaves are blanched to a golden yellow. Pkt., 10c; oz., 20c; ½ lb., 50c.

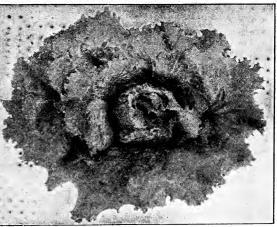
New York or Los Angeles. Plants of extra large growth, producing closely folded heads of immense size. The inner portion is beautifully blanched; outer leaves a deep, rich green.

Pkt., 10c; oz., 25c; ½ lb., 90c.

yahead. It is not only earlier than May King, and other fine early varieties, but the tightly folded heads are generally larger in size. The outer leaves are a light green, with the inner head finely blanched to a rich buttery yellow.

Pkt., 10c; oz., 20c; ½ lb., 50c.

nson. Heads green with white heart. Large size, crisp, tender.....Pkt., 10c; oz., 20c; ¼ lb., 50c.



Grand Rapids

Romaine, Cos, or Celery Lettuce

HESE are distinct from the ordinary Lettuce, and much liked on account of their crisp, tender quality and delicate flavor. They produce long, narrow leaves, which are blanched by drawing in the outer leaves and tying.

Paris White Cos. One of the best varieties for blanching; very tender......Pkt., 10c; oz., 25c; 1/2 lb., 75c. Trianan Self-Folding. A self-blanching Cos Lettuce, very crisp and tender, and of excellent flavor.

Pkt., 10c; oz., 25c; 1/2 lb., 75c

MUSKMELONS

One ounce will plant about 50 hills; 2 to 3 pounds in hills per acre.

In selecting a patch for melons be careful to have it at a safe distance from your Squashes, Cucumbers, Pumpkins, etc., or they will certainly mix. In preparing the hills, fork in plenty of manure, and about the middle of May, when the ground is warm, plant in each hill eight or ten seeds, and cover half an inch deep. After the danger from bugs is over, pull all but three or four of the strongest plants. As soon as the vines have run sufficiently and spread their branches—stop them by pinching the top off the first running bud. This will strengthen the plants and promote their perfecting fruit early. The ground should be kept free from weeds and frequently cultivated.

Acme. Medium size oval slightly pointed at end ribbed, covered when ripe, with coarse netting. Flesh thick, green, very fine flavored and sweet.

Pkt., 10c; oz., 15c; 1/4 lb., 40c.

Burrell Gem. Oblong in shape, smoothly rounded ends, closely netted and slightly ribbed, dark green skin. Rind thin, but very tough; flesh exceptionally deep, rich salmon-orange color. Fruit averages 6 inches long by 4 inches deep......Pkt., 10c; oz., 15c; ¼ lb., 40c.

Defender. Medium size, salmon flesh, and delicious flavor; oval shape, slightly ribbed and covered with a slight netting..........Pkt., 10c; oz., 15c; ½ lb., 40c.

Emerald Gem. Ripens early; medium size; nearly round; flesh a delicate salmon color, very thick, fine grained, and superb flavor. The rind is thin dark green, ribbed, slightly netted......Pkt., 10c; oz., 15c; ½ lb., 50c.

Extra Early Hackensack. Produces melons two weeks earlier than the well-known Hackensack; heavily netted, and has light green flesh of most delicious flavor; a splendid Cantaloupe Melon.

Pkt., 10c; oz., 15c; 1/4 lb., 40c.

Golden Champlain. The extreme earliness of the Golden Champlain, which has made a record of ripening melons in 57 days from planting seed in the open field, puts it ahead of all others in this respect. It is only a short time after the melons attain full size until they are ripe.

The flesh is of a very rich golden color, very thick, fine and of delicious flavor clear to the rind. It is covered on the outside with a heavy gray netting, over a dark green skin. The size averages from two to three pounds in weight, is nearly round, and slightly ribbed.

The yield of marketable melons is what really counts in your profit; the Champlain sets a heavy crop and ripens them quickly. There is no other melon which combines all the desirable points as does the Golden Champlain.

The Seed we offer is genuine originator's seed.

Pkt., 10c; oz., 40c; 1/2 lb., \$1.00; 1 lb., \$3.00.

Hackensack. Melons grow to large size and attractive appearance. Flesh green, very sweet and sugary. Outer skin is heavily netted.

Pkt., 10c; oz., 15c; 1/4 lb., 40c.

Hales Best. (Early Imperial.) This melon is an early and heavy yielder. Flesh firm, salmon tint in color; rind is well netted and attractive. Seed cavity is very small.

Pkt., 10c; oz., 15c; 1/4 lb., 50c.



Golden Champiain

Hearts of Gold. Just the right size to cut in halves and serve alone or with Ice Cream. Flesh is deep orange, extremely thick, fine grained and as sweet as honey. Always free from stringiness; closely netted, very solid, almost blight-proof...Pkt., 10c; oz., 15c; ½ lb., 50c.

Honey Ball. This melon is one of the most prolific early varieties grown, as it matures about one week later than the Rocky Ford, or in approximately 105 days.

It is as round as a ball and has a very thick wall of delicious green meat clear to the rind. The seed cavity is small, rind is tough and consequently is a good shipping melon. Its color is greenish white until it is fully ripe, when it turns a creamy white or bright yellow, slightly netted. It has a high sugar content and a delicious flavor.

For home use, the melons should be pulled when apparently ripe and stored away for a few days before using. The melons, being of uniform large size, pack nicely twelve to the crate.

Pkt., 10c; oz., 50c; ¼ lb., \$1.50; 1 lb., \$4.00.

Honey Dew. Average size is about six to eight inches in diameter, and they weigh five to six pounds. Skin smooth with little netting, and of creamy yellow color when ripe. Flesh is green, thick, melting, fine grained and can be eaten almost to the rind. Not easily bruised, and stands shipping long distances. Easily pulled when ripe and will keep for several weeks. Matures about ten days later than the Rocky Ford.

Pkt., 10c; oz., 15c; ½ lb., 50c.

Improved Green Nutmeg. A large melon, nearly round, deeply ribbed; flesh thick, light green, delicious flavor.

Pkt., 10c; oz., 15c; 1/4 lb., 40c.

Ohio Sugar. The flesh is an attractive green of fine texture, sugary, juicy, tender and free from stringiness. It is round, inclined to oval, distinctly ribbed, and thickly netted. Because of its firm flesh and solidity, it is a splendid shipper. Pkt., 10c; oz., 15c; ½ lb., 50c.

Osage, or Miller's Cream. A favorite salmon-fleshed variety. Large oval, slightly ribbed and netted; skin is very dark green. Flesh is very thick and sweet flavored, most delicious to the rind.

Pkt., 10c; oz., 15c; ¼ lb., 50c.

Rocky Ford. The reasons for the widespread popularity of these melons are their superb table and wonderful shipping qualities which enable them to be carried great distances, and yet arrive in first-class condition for market. The fruit is of medium size, oval shaped, heavily netted and very solid. The flesh is green, thick and juicy. It is early and wonderfully productive.

Pkt., 10c; oz., 15c; 1/4 lb., 40c.

Tip-Top. A medium sized Muskmelon, nearly round in shape, with shallow netting on skin. The flesh is deep yellow and has a rich flavor. The constantly increasing demand for our strain of Tip-Top Melon Seed permanently establishes its superiority.

Pkt., 10c; oz., 15c; ¼ lb., 50c.

WATERMELONS

WHILE a sandy loam is preferable for Watermelons they can be grown on a loamy soil having a clay subsoil, provided it is deeply plowed. When ground is warm, plant 6 to 8 seeds in hills 6 to 10 feet apart each way and cover about 1 inch deep. When well up, thin out to 2 vines in each hill. Do not plant on land where Watermelons were grown before, as the vines exhaust elements in the soil which makes succeeding crops defective.

Watermelons are slightly less subject to "bug" depredations and disease attacks than Muskmelons. At the same time they are more easily hurt by strong spray mixtures, and caution in the use of such mixtures is advisable.

Bibault. This new melon is long and thick in shape, measuring 24 to 30 inches long by 16 to 20 inches in diameter. The rind is dark green, indistinctly striped, medium thick and will stand rough usage during shipping. The meat is red and sweet and free from hard centers.

Pkt.,10c; oz.,20c; 1/4lb.,50c; per lb.,\$1.50. FRU. 10c; 0Z., 20c; ½10., 50c; per 10., \$1.50.

Excel Improved. Will produce more large, marketable melons under the same conditions than any of the other sorts of the long variety, and its carrying and keeping qualities are unsurpassed. Fruit oblong in shape, dark green color with tracings of light green. Flesh deep red, crisp and tender. Weight, 35 to 60 pounds. Pkt., 10c; oz., 15c; ½ lb., 30c; per lb., \$5c.

Tom Watson. An extra long melon of

Watson. An extra long melon of attractive appearance, uniform in shape and quality. The luscious crimson flesh is "as sweet as honey" and of superb flavor. The average melon will weigh 30 to 40 pounds and measure about 28 inches long and about 12 inches in diameter. It is very prolific.

Pkt.,10c; oz.,15c; ½ lb.,30c; per lb.,85c.

PKt.,10c; 02.,10c; ½ 10.,30c; per 10.,30c.

ne Mountain. (Dixie Bell.) A new introduction of best quality, and is claimed to be the sweetest of all the large melons; in shape it is almost round, dark green rind, medium thick, flesh rich scarlet, not unusual to grow Stone Mountain weighing 70 to 80 pounds; for home and nearby markets it is unexcelled, seed white with black tips; time for ripening, 90 days.

Pkt., 10c; oz., 15c; ½ 1b., 40c; per 1b., \$1.00. Stone Mountain.

Reckley's Improved. This improved type grows uniformly large, retaining all the fine qualities as a table melon, with an important added feature of having much harder rind, which assures its satisfactory carrying qualities for long distances. Color of rind is dark bluish green and grows to a much larger size than the old type....Pkt., 10c; oz., 15c; ½ lb., 30c; per lb., 85c.

Irish Grey. The size is uniform and large. Color of rind yellowish-gray and almost as tough as that of the Citron. Ripens earlier than Watson and will keep in good condition for a long time after picking. Very prolific and a good shipper. A fine market sort.

Pkt., 10c; oz., 15c; ½ lb., 30c; per lb., 85c.

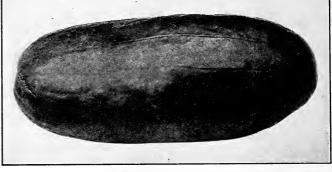
Cole's Early. A very early variety. Large heart, flesh of fine texture and good flavor. Rind thin. Fine for the home zarden.

the home garden.

Pkt., 10c; oz., 15c; ¼ lb., 30c; per lb., 85c. Fordhook Early. The fruit is of good size, rather short and blocky in form, with large diameter. Skin dark green, occasionally with faint stripes of lighter green. Rind quite thin, but skin tough, making an excellent shipping variety. Flesh bright red, crisp, sweet, and of salvadid quality. and of splendid quality.

Pkt., 10c; oz., 15c; ¼ lb., 30c; per lb., 85c.

Gray Monarch. Large size; long in shape; the skin is a mottled gray; flesh bright crimson and of sweet, delicious flavor...Pkt., 10c; oz., 15c; ¼ lb., 30c; per lb., 85c.



Kleckley's Improved

Halbert Honey. A very sweet, long, dark green variety.
Fruit averages 18 to 20 inches long, has a thin rind and deep red meat of delightfully delicious flavor; seeds white. One of the finest for the home garden.
Pkt., 10c; oz., 15c; ½ lb., 30c; per lb., 85c.
Florida Favorite. Oblong in shape, growing to large size; rind dark, with light green stripes; flesh light crimson, crisp and deliciously sweet.
Pkt., 10c; oz., 15c; ½ lb., 30c; per lb., 85c.
Sweetheart. Flesh bright red, solid, and tender.
Pkt., 10c; oz., 15c; ½ lb., 30c; per lb., 85c.
Dark Icing, or Ice Rind. A very solid sort with a thin rind, and possesses most delicious flavor.
Pkt., 10c; oz., 15c; ½ lb., 30c; per lb., 85c.
Long Light Icing. The skin is a mottled gray color, shape long, flesh bright crimson and sweet.
Pkt., 10c; oz., 15c; ½ lb., 30c; per lb., 85c.
Peerless, or Ice Cream. Of medium size; skin light mottled green; flesh scarlet.
Pkt., 10c; oz., 15c; ½ lb., 30c; per lb., 85c.
Rattlesnake, or Gypsy. Fruit large, oblong, striped; flesh red.

flesh red. Pkt., 10c; oz., 15c; ¼ lb., 30c; per lb., 85c.

MUSTARD

One ounce will sow 100 feet of drill.

A SMALL, pungent salad used like Cress. The seed is also used for flavoring pickles, pepper sauce, etc. For salads sow thickly in shallow drills, 6 inches apart, or in frames or boxes during the winter, where frost can be partially excluded. Successive sowings can be made every week or two. To grow seed, sow in April, in rows 1 foot apart, and thin out to 3 inches apart when 2 inches high.

White English. Best for salads.

Pkt.. 10c; oz., 15c: ½ lb., 30c.

Chinese, or Giant Southern Curled. The large leaves, which often measure 14 inches, are ready for use in about six weeks after sowing. Leaves are eaten boiled like Spinach......Pkt., 10c; oz., 15c; ½ lb., 30c.



OKRA, OR GUMBO

One ounce of seed for 300 plants.

THIS vegetable is extensively grown for its green pods. which are used in soups, stews, etc., to which they impart a rich flavor, and are considered nutritious. Sow the seed thickly in rich ground, about the middle of May, or when the ground has become warm, in drills 3 feet apart, 1 inch deep; thin to 12 inches apart in drills. Culture otherwise much like Corn.

Perkins Mammoth. The pods grow 4 to 5 inches in length and are very tender, long, slim and deep green; plant is dwarf, and very productive.

Pkt., 10c; oz., 15c; ½ lb., 25c.

Pods are round, smooth, velvety white; of superior flavor and Plants dwarf, very prolific.....Pkt., 10c; oz., 15c; ½ lb., 25c. White Velvet. tenderness.

The best of the dwarf sorts. It makes a stocky growth of plant productive. The pods are long, slender and of a light green color. Pkt., 10c; oz., 15c; ¼ lb., 35c. Dwarf Green. and is very productive.

Taller than the preceding, bearing long, ridged pods. Highly eshe South......Pkt., 10c; oz., 15c; ¼ lb., 25c. Long Green. Taller than the preceding teemed in the South.....



MUSHROOM SPAWI

One pound of Spawn is sufficient for a bed 2 x 6 feet. MUSHROOMS can be successfully and profitably grown during the winter and spring months in frames under greenhouse benches, in the open fields, or in cellars or out-houses.

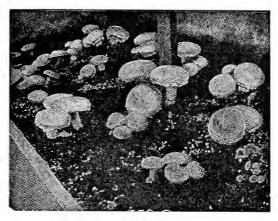
We supply many of the largest commercial growers in the United States and have on hand at all times in the season fresh Spawn of the best manufacture.

season fresh Spawn of the best manufacture.

American Made Pure Culture Mushroom Spawn. A
very superior article, made in this country from carefully
selected spawn, which it is claimed is much more
vigorous than the imported article, and will produce
mushrooms of a very superior quality and flavor. The
popularity of Pure Culture Spawn is increasing rapidly
and many of the large growers are now using it. They
claim it is a surer crop. Amateurs have much the best claim it is a surer crop. Amateurs have much the best results with this kind. By express—customer to pay charges. Per brick, 30c; 5 bricks, \$1.25; 100 bricks, \$20.00. By mail, 35c per brick, 5 bricks, \$1.50, postpaid.

Mushroom Culture. (Wm. Falconer.) The most practical work on the subject; \$1.00.

Treatise on Mushroom Culture. 10c, or given with an order of 10 lbs. of Mushroom Spawn
Special Prices will be given to those who use Mushroom Spawn in quantity.



ONION SEED

POR sets, drill the seed thickly as early as possible in the Spring. As soon as the tops dry off in the Summer, remove to a dry, airy place. May also be grown to full size the first season by sowing thinly in drills one foot apart and one-quarter inch deep, in March or early April, thinning to three or four inches apart. apart.

By sowing in frames in February or March and transplanting in April, onions of immense size can be obtained. For this purpose the Southport Globe varieties (white and yellow) and Prizetaker are usually preferred. Onions delight in a strong, rich, deep loamy soil, and succeed well if grown successive years on the same ground.

One ounce for 150 feet of drill. 5 to 6 pounds for one acre. Onion seed for sets, 30 to 40 pounds per acre

Yellow Globe Danvers. A standard sort; an excellent keeper and very productive. Our strain of this variety is the true globe shape, and not of the flat type. It is the best paying onion that is grown for general crop, and has been the leading variety for years.

Pkt., 10c; oz., 25c; ½ lb., 75c.

Ohio Yellow Globe. Sure cropper: long keeper; early.

This fine strain is of that extreme type of Globe now so deservedly popular in all large Onion markets. Its main points of excellence are: Distinct and attractive shape; handsome, bright, even color; necks very small; ripens early and all at once. The solid bulbs are excellent winter keepers, and all that can be desired in size and quality.....Pkt., 10c; oz., 25c; ½ lb., 75c.

a Crais. This variety grows to an enormous size. By using the transplanting method, specimens have been grown to weigh 3 pounds. It is globe-shaped, has a fine straw-colored skin and is of very mild flavor. The shape and color together with its great size makes this sort ideal for exhibition purposes.

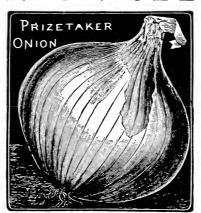
Pkt., 10c; oz., 25c; ½ lb., 75c. Ailsa Craig.

Prizetaker. The true Prizetaker is globe shape, has pale yellow skin and white flesh, which is very mild and of delicate flavor. It is strictly "fancy", and will be found on fruit stands during the fall, where it is sold as Spanish Onion. No sets are required, as the large Onions are grown the first year from seed sown during early spring.

Pkt., 10c; oz., 25c; ½ lb., 75c.

Ebenezer (Japanese). This is the mildest yellow Onion in our list. The Onions are large, somewhat flattened, have attractive yellow skin and firm white flesh of delicate flavor; very small top and ripens quite early for so large a variety. One of the best keeping sorts. Sets of the Ebenezer keep almost indefinitely.

Pkt., 10c; oz., 25c; ½ lb., 75c.



Yellow Danvers. Bulb of good size and flat, the standard yellow onion for market or home use, being both early and an enormous yielder as well as good keeper.

Pkt., 10c; oz., 20c; 1/4 lb., 60c.

Yellow Dutch, or Strasburg. A good keeper and well flavored; bright straw colored skin and the straw flattened shape. The Onions grow to a good size and are very mild. This variety is largely grown for sets.

Pkt., 10c; oz., 20c; 1/4 lb., 60c.

ge Red Wethersfield. Grows to full size the first season from seed. The Onions are large, flat in shape, with skin of a purplish-red color and flesh of a purplish-white color. rather Red Wethersfield. Large purplish-white color. rather strong-flavored; an excellent keeper.

Pkt., 10c; oz., 25c; 1/4 lb., 75c.

Southport Red Globe. Beautiful globe-shaped; of medium size, a good keeper and of superior quality. Very popular in some sections. Pkt., 10c; oz., 25c; ½ lb., 75c.

White Portugal, or Silver Skin. This variety is one of the leading white sorts. The bulbs are flat in shape and mature early. Largely used for growing sets.

Pkt., 10c; oz., 25c; ½ lb., 75c.

Southport White Globe. Pure white color, mild flavor. A good keeper and very productive. It is best to dry these Onions in a shady place, where they will get plenty of air.....Pkt., 10c; oz., 40c; ¼ lb., \$1.50.

Mammoth Silver King. A large, flat variety. Specimens have been grown to weigh as high as 4 pounds. Skin pure white and flesh tender.

Pkt., 10c; oz., 30c; ¼ lb., \$1.00.

ite Queen. A rapid-growing variety of mild flavor; pure white, and splendid for pickling.

Pkt., 10c; oz., 30c; ½ lb., \$1.00.

White Barletta. An extra early small white Onion; similar to White Queen....Pkt., 10c; oz., 30c; ½ lb., \$1.00.

Early White Bunch. Used largely for pulling when young, as a bunch Onion. If left to mature, grows to good size; very showy. Pearly white skin. Flesh of good quality and a good keeper. Pkt., 10c; oz., 30c; ¼ lb., \$1.00.

ONION SETS

Onion Sets should be planted out as early in the Spring as the ground is dry enough to work; plant them in rows 12 inches apart, with sets 2 inches apart in the row. We handle sets of the standard varieties. Prices subject to market changes.

Lowest market price will be given upon applica-

PARSNIP

One ounce for 200 feet of drill. 4 to 5 pounds for an acre.

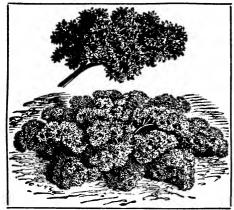
Sow seed early in spring, in deep, rich soil in drills. Scatter the seeds thinly and cover evenly with a rake. After the appearance of the plant, the soil must be stirred frequently until the leaves cover the ground. The seed is slow to germinate, and is frequently a long time in coming up; will vegetate sooner by steeping 6 to 12 hours in a liquid manure, diluted with water and mixed with sand before sowing. When well up, thin out to 5 to 6 inches apart in the rows. Unlike Carrots, they are improved by frost, and it is usual to take up in fall a certain quantity for winter use, leaving the rest in the ground until spring, to be dug as required.

Large Sugar, or Hollow Crown. The best variety; roots long, very smooth, white, tender, sugary and of excellent flavor. This strain was made by careful selection of roots growing to an ideal shape and having the distinct hollow crown.

Pkt., 10c; oz., 15c; 1/4 lb., 35c.

Student, or Guernsey. A good half-long variety, smooth, sweet and of delicate flavor..Pkt., 10c; oz., 15c; ½ lb., 35c.





Norwood

PARSLEY

One ounce to 200 feet of drill.

Sow thickly early in April, in rows one foot apart and one-half inch deep; thin out the plants to stand six inches apart in the rows. The seed is of slow germination, taking from three to four weeks to make its appearance, and often failing to come up in dry weather. To assist its coming up quicker, soak the seed a few hours in warm water, or sprout in damp earth, and sow when it swells or bursts. For winter use, protect in frame or light cellar.

Extra Double Curled. Beautifully crimped and curled. Pkt., 10c; oz., 15c; ½ lb., 35c.

Moss Curled. Fine for garnishing. Pkt., 10c; oz., 15c; 1/4 lb., 35c.

n. A hardy variety having dark green leaves which are not curled. It is a little stronger in taste and much esteemed for flavoring soups and stews, as well as for drying.

Pkt., 10c; oz., 15c; 1/4 lb., 35c.

Hamburg Turnip Rooted. The fleshy root resembles a parsnip and is used for flavoring soup, stews, etc.

Pkt., 10c; oz., 15c; 1/4 lb., 35c.

PEPPER

One ounce of seed for 1,500 plants.

SOW early in the spring in hotbeds, if possible, and transplant to the open ground when the weather is favorable, or sow in drills in warm, mellow soll late in the spring, and then thin out so as to stand 18 inches apart.

stial. Fruit conical in shape, one to two inches long; green from the blossom, turning alternately to lemon, golden and scarlet.

Pkt., 10c; oz., 40c; ¼ lb., \$1.50. Celestial.

Ruby Giant. This fine variety is a cross between the Chinese Giant and Ruby King. The fruits are quite early, averaging 4½ inches long and 3½ to 4 inches wide at the thick end, of shape similar to Chinese Giant but far more uniform and more handsome. The flesh is very thick with comparatively few seeds, and mild. Color is a beautiful deep green when young; brilliant ruby-scarlet when ripe.

RUBY KING Pepper

Large Bell, or Bull Nose. Large and early; rind very thick; color glossy red; flavor mild and pleasant.

Pkt., 10c; oz., 40c; ½ lb., \$1.25.

nento. The fruit is of good size, medium length and attractive color. The flesh is thick and solid, mild and of fine flavor. Desirable for salads and stuffed peppers. The plants are vigorous and upright, about two to two and one-half feet high, with short, broad, dark green leaves. The fruit is deep green when young, becoming deep red as it matures. Pkt., 10c; oz., 40c; ½ lb., \$1.25. Pimento.

Long Red Cayenne. From 3 to 4 inches long, bright red color, very productive and hot.

Pkt., 10c; oz.. 40c; ½ lb., \$1.25.

Small Cayenne, or Red Chili. Pods 1½ to 2 inches long, very hot; used for making pepper sauce.

Pkt., 10c; oz., 40c; ½ lb., \$1.25.

GARDEN PEAS

One pound will plant about 50 feet of drill—90 to 120 pounds per acre.

PEAS succeed best in light, dry, loamy soil. Early and Dwarf sorts require richer soil than the late varieties. If manure is used, let it be old and well rotted, or there will be a rank growth of vines with few pods. Sow the early, smooth, round sorts as early in spring as the ground can be worked. Seeds of wrinkled varieties are more liable to rot if the ground is cold, and must be planted later. From the first sowing, sow every two weeks until June for a succession. After that there is danger of mildew. Discontinue then until August, when a planting of extra early or early sorts will often produce a good crop. Sow the seed in single drills, three feet apart for dwarf sorts and four for tall sorts, or in double drills six or eight inches apart, one inch apart in the drill, and not less than four inches deep, since deep planting prevents mildew and prolongs the season. Cultivate well, and draw the earth twice to the vines during growth. Stake the tall varieties when they begin to vine. Pick the pods as soon as fit, and allow none to ripen on the vines, as they will then cease bearing. All kinds of Peas do best when supported with brush or wire.

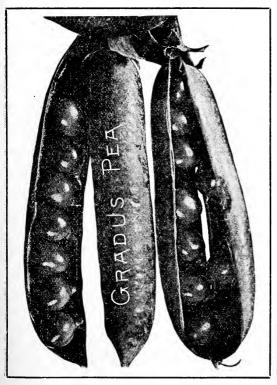
All varieties of Peas. pkt., 10c., postpaid: for larger quantities by mail, see "Postage" 2nd page of cover.

Early Varieties

The earliest and most prolific Pea known. The pod is of a dark green color, of a full, round shape, and of strong texture, which especially fits few equals, and is the market gardener's favorite for all seasons. The far northern point at which our Peas are grown renders them almost proof against cold, and the best for early spring or late fall crop. Thousands of market gardeners have pronounced this Pea unequaled in earliness, yield and regularity of growth. Make first planting as early in the spring as the ground will permit and cover well. Pkt. 10c: 14 lb. 20c: 1 lb. 30c: 5 lbs. \$1.20: 15 lbs. \$3.00.

Pkt.,10c; ½ lb.,20c; 1 lb.,30c; 5 lbs.,\$1.20; 15 lbs.,\$3.00.

ska. A wonderful early, smooth, blue Pea; vines slender; pods very dark green, about three inches long, well filled with small, smooth, blue-green peas. The earliness, uniformity in ripening and deep color render it a desirable market and canning pea; height 2 feet. Pkt., 10c; 1/2 lb., 20c; 1 lb., 30c; 5 lbs., \$1.20; 15 lbs., \$3.00





Laxtonian. The pods of Laxtonian are very large, and are produced on a low-growing, sturdy vine, without support of any kind. The flavor is just as rich and good as any of the later varieties. It is ready for use about a week later than the very early sorts, and is incomparably good in quality. Pods and plant are rich, dark freen in color.

Pkt..10c; ½ lb..20c; 1 lb..35c; 5 lbs..\$1.35; 15 lbs..\$3.75.

Little Marvel. As early as American Wonder and Nott's Excelsior, the pods are larger and the vines produce a heavier crop. For quality and productiveness it is away ahead of everything in the way of extra early wrinkled peas. It is dwarf, growing about 15 inches high, and the plants are very productive, bearing many twin pods, which are dark green in color.

Pkt..10c; ½ lb..20c; 1lb..30c; 5 lbs..\$1.25; 15 lbs..\$3.25.

American Wonder. This variety stands unrivaled in point of flavor and quality. It is dwarf and robust in habit, growing from 10 to 15 inches in height, according to soil. Pkt..10c; ½ lb..20c; 1 lb..30c; 5 lbs..\$1.25; 15 lbs..\$3.25.

Nott's Excelsior. A dwarf wrinkled Pea of the highest excellence. The pods average three inches in length and are well filled with peas of large size and unusually sweet flavor; height one and one-fourth feet.

Pkt..10c; ½ lb..20c; 1 lb..30c; 5 lbs..\$1.25; 15 lbs..\$3.25.

Premium Gem. An improved Little Gem Dwarf, green, wrinkled, very prolific, fine flavored, large pods, excellent either for market or home use; height, one and one-half feet.

Pkt..10c; ½ lb..20c; 1 lb..30c; 5 lbs..\$1.10; 15 lbs..\$3.00.

Gradus or Prosperity. This remarkable Pea is not only

one-half feet.
Pkt.,10c; ½ lb.,20c; 1 lb.,30c; 5 lbs.,\$1.10; 15 lbs.,\$3.00.
Gradus or Prosperity. This remarkable Pea is not only large and of the best quality, but is within two or three days as early as the small, round, extra early sorts. Gradus is a wrinkled Pea, growing about 30 inches high; the pods are of a bright green color, measuring 4 inches or more in length, as large as Telephone, well filled with luscious peas, 8 or more in a pod. The peas are of the highest table quality and retain, in a remarkable manner, their color and attractive appearance after cooking. Make the earliest sowing in the warmest spot in the garden.

markable manner, their color and attractive appearance after cooking. Make the earliest sowing in the warmest spot in the garden. Pkt..10c; ½ lb.,20c; 1 lb.,30c; 5 lbs.,\$1.25; 15 lbs.,\$3.25. Thomas Laxton. A cross between Gradus and one of the Extra early sorts. It ripens within a day or two of the earliest round varieties, and is extremely productive. The pods are very large and contain 7 or 8 large-sized wrinkled peas of the finest flavor. It is darker colored than the Gradus and hardier in constitution; height, three feet. Pkt..10c; ½ lb.,20c; 1 lb.,30c; 5 lbs.,\$1.25; 15 lbs.,\$3.25.

WE HANDLE PEAS BY THE CARLOAD—Wrifor Special Prices If You Use Them in Quantity.

GARDEN PEAS—Continued

All varieties of Peas, Pkt., 10c. postpaid; for larger quantities by mail, see "Postage" 2nd page of cover.

Second Early and Main Crop

Dwarf Telephone or Daisy. A mid-season variety; vines dwarf and produce large, bright green pods containing peas of finest quality.

Pkt., 10c; ½ lb., 20c; 1 lb., 30c; 5 lbs., \$1.35; 15 lbs., \$3.50

Advancer. This Pea is used very extensively by market gardeners on account of its productiveness, the fine appearance of its pods and its exceedingly fine flavor. It is a wrinkled variety, grows about two feet in height, but needs no brushing as it stands up very strong itself. Has broad, long pods. which are abundantly produced and well filled to the end.

Pkt., 10c; ½ lb., 20c; 1 lb., 30c; 5 lbs., \$1.25; 15 lbs., \$3.25.

Admiral Dewey. The largest podded Pea yet introduced. Height, 3 ½ feet; pods a rich, dark-green color, frequently 6 inches long, beautifully shaped. Peas large, tender and of fine flavor.

Pkt., 10c; ½ lb., 20c; 1 lb., 30c; 5 lbs., \$1.25; 15 lbs., \$3.25.

elephone. The favorite late variety; extra large pods. This Pea has proven to be a most valuable introduction. Vine large, leaves coarse, height about 4 feet. The pods are very large and filled with immense peas, which are largest of any. Tender, sweet and of splendid quality and flavor. A valuable feature of this variety is that it continues in bearing for an extremely long time. The stock we offer has been selected with every care, and will give satisfaction to the most exacting grower.

Pkt., 10c; ½ lb., 20c; 1 lb., 30c; 5 lbs., \$1.25; 15 lbs., \$3.25.

Alderman. A new Pea like the Telephone, only better. The vine is extra vigorous, and the pods of Alderman are dark green and always well filled with fine large peas. For a pea which should be staked there is none quite so good as Alderman. It is one of the finest of the large-podded summer varieties. The haulm grows five feet in height and is of a rich, dark green coloring, as are also the large pods. Pods frequently measure nearly six inches in length and contain from ten to twelve very large peas of superior flavor.

Pkt., 10c; ½ lb., 20c; 1 lb., 30c; 5 lbs., \$1.25; 15 lbs., \$3.25.

Improved Champion of England. One of the best known of the older varieties; a tall growing, green, wrinkled marrow; quality unsurpassed; pods medium; peas large. Five feet.

Dwarf Sugar. Edible pods. Can be used in a green state like string beans. Height, five feet...... Pkt., 10c; ½ lb., 20c; 1 lb., 30c; 5 lbs., \$1.25; 15 lbs., \$3.50.

Pkt.. 10c; ½ lb., 20c; 1 lb., 30c; 5 lbs., \$1.25; 15 lbs., \$3.00.

Mammoth Luscious Sugar. This variety grows to a height of five feet and bears profusely, long, broad, light green pods. If picked when about half grown, broken and boiled like string beans and served with butter sauce, they make a luscious dish............Pkt., 10c; ½1b., 20c; 1 lb., 30c; 5 lbs., \$1.25.

PEANUTS

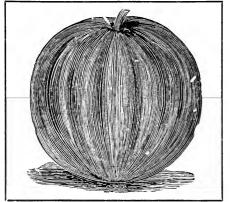
 $S^{\rm HELL}$ the nuts and piant in April or May in drills 2 to $2\frac{1}{2}$ feet apart, dropping 2 seeds 12 to 15 inches apart in the drills.

..Pkt., 10c; ½ lb., 20c; per lb., 30c.

PUMPKIN

One ounce for 25 hills

THEY are generally planted in cornfields, but they can not grow as large or fine as if the vines were not shaded. A good plan would be to plant a few seeds in the potato patch, as they are less apt to be injured by the crop of potatoes than of corn.



Large Cheese

Large Cheese. An excellent keeper, color bright orange. Pkt., 10c; oz., 15c; ½ lb., 25c; per lb., 75c.

Cashaw Crook-Neck Striped. Grows to a medium size; flesh light yellow, and is the best variety for table use. Pkt., 10c; oz., 15c; ½ lb., 40c; per lb., \$1.50.

Golden Cashaw. Beautiful golden-orange color; an improvement on the old Cashaw.

Pkt., 10c; oz., 15c; ½ lb., 40c; per lb., \$1.50.

Japanese Pie. Is very productive, ripens early, of medium size, good keeper, and weighs 15 to 20 pounds each. The flesh is a rich salmon color.

Pkt., 10c; oz., 15c; ½ lb., 40c; per lb., \$1.50.

Mammoth Tours. A productive French variety, which grows to an immense size. Yelt., 10c; oz., 15c; ½ lb., 40c; per lb., \$1.25.

Small Sugar. Fruit of small size, averaging about ten inches in diameter, of excellent keeping qualities, flattened or slightly ribbed. Skin deep orange-yellow, flesh very sweet. This should be more generally grown, as it is really one of the best for pies.

Pkt., 10c; oz., 15c; ½ lb., 30c; per lb., \$1.00.

Tennessee Sweet Potato. Medium size, pear-shaped, a little ribbed, color creamy white, sometimes lightly striped with green.
Pkt., 10c; oz., 15c; ½ lb., 40c; per lb., \$1.50.

Connecticut Field. A large, yellow variety. Pkt., 10c; oz., 15c; ½ lb., 25c; per lb., 70c.

Kentucky Field. Good for cooking purposes and for feeding stock.
Pkt., 10c; oz., 15c; ½ lb., 25c; per lb., 60c.

RADISH

One ounce to 100 feet of drill-8 to 10 pounds for an acre.

Sow early and often. In good, warm, fibrous loam; especially if quite sandy, summer Radishes will make a crop in 4 to 6 weeks from sowing. The soil should be well prepared, and fertilizers may be used freely. Have the rows a foot apart, and sow just seed enough so that they will not require thinning. Any little spot that becomes available during summer may be utilized for planting Radishes. The short or turnip-rooted sorts are quickest and easiest to grow, and good for forcing also. On greenhouse bench or in frames the rows need not be more than 4 inches apart. Sow winter Radishes in July and August. They grow best in the cooler Autumn weather. Take them up before severe freezing and store in sand in the cellar or in a plt, where they will keep tender and crisp all winter.

Special prices given to market gardeners.

We were the introducers of this remarkable radish, which has proven one of the
best long Radishes ever offered. It is
gardeners. The tops are so small that the radishes may stand touching
each other in the rows. They grow perfectly straight and smooth
and from six to seven inches in length. Their attractive, glossy,
scarlet skin is very thin and the flesh crisp and brittle, and of delightful pungent flavor. It is the finest Long Red Radish for forcing and
out-sells any other that is put in competition with it on the market.
Being long standing, it is also an extra fine sort for the home garden,
entirely exempt from any tendency to become pithy or hollow. We were the introducers of this remark-

out-sells any other that is put in competition with it on the market. Being long standing, it is also an extra fine sort for the home garden, entirely exempt from any tendency to become pithy or hollow.

Pkt. 10c; oz., 15c; ½ lb., 30c; per lb., \$1.00.

Crimson Giant. This variety is suitable both for forcing or early planting out of doors. A remarkable feature of this Radish is that it will grow double the size of other round red forcing Radishes and still remain solid. The ordinary forcing Radish, after growing to the size of 2 inches in circumference becomes pithy, while the Crimson Giant will grow to 6 inches in circumference, and still remain solid and juicy, free from all signs of becoming soft.

Pkt., 10c; oz., 15c; ½ lb., 30c; per lb., \$1.00.

Non Plus Ultra. The smallest topped and earliest forcing Radish. Roots small, round; deep rich scarlet; very crisp and tender, white flesh. Pkt., 10c; oz., 15c; ½ lb., 30c; per lb., \$1.00.

Bosy Gem. We have a very clean and beautiful strain of this popular sort. It is extremely early, maturing in 25 days, and is largely used for growing both under glass and outdoors. It is round, bright scarlet and has a handsome white tip.

Pkt., 10c; oz., 15c; ½ lb., 30c; per lb., \$1.00.

Earliest White Globe. The earliest white olive-shaped Radish in existence, beautiful, transparent ivory-white, very small root, small top; flesh white, tender and crisp. It is particularly adapted to forcing in greenhouse or hot-bed, also does well in open ground.

Pkt., 10c; oz., 15c; ½ lb., 40c; per lb., \$1.25.



Cincinnati Market

Scarlet Globe. One of the earliest and best sorts for forcing; flavor mild; crisp and juicy; also good for garden culture.

Pkt., 10c; oz., 15c; ¼ lb., 30c; per lb., \$1.00. Scarlet Turnip. A small top variety, of quick growth, mild and crisp. It is a standard sort for early planting in the open ground.

Pkt., 10c; oz., 15c; ½ lb., 30c; per lb., \$1.00.

Scarlet Turnip, White Tipped. Bright scarlet color, gradually fading off to pure white at the base, tender and mild in flavor, early.

Pkt., 10c; oz., 15c; ¼ lb., 30c; per lb., \$1.00.

White Turnip. An early, crisp, turnip-shaped Kadısı or pure white color.

Pkt., 10c; oz., 15c; ¼ lb., 30c; per lb., \$1.00. An early, crisp, turnip-shaped Radish of

French Breakfast. A variety of quick growth, mild and tender, and one of the best for forcing. Oval form, scarlet, tipped with white.

Pkt., 10c; oz., 15c; ½ lb., 30c; per lb., \$1.00.

Golden Globe. Perfect globe-shape, and golden-colored skin, quick growth, tender and brittle.
Pkt., 10c; oz., 15c; ½ lb., 30c; per lb., \$1.00.



Fine long white Radish, with beautiful shape; skin and flesh, pure white.

Pkt...10c; oz., 15c; ½lb.,30c; per lb., \$1.00.

Fine long white Radish, with beautiful shape; skin and flesh, pure white.

Pkt...10c; oz., 15c; ½lb.,30c; per lb., \$1.00.

ite Icicle. The finest long, white Radish; the young Radishes are ready for use in 25 days, and continue to grow, fully retaining their crisp tenderness and mild flavor until quite large. These Radishes are transparent white, have small tops, allowing close planting, and are very crisp and brittle. A feature greatly in its favor is that it remains in good condition while growing for a long time, thus allowing a continuous pulling from the same planting.

Pkt., 10c; oz., 15c; ½ lb., 30c; per lb., \$1.00. White Icicle.

White Strasburg. Oblong, tapering shape, skin and flesh pure white, firm and brittle; fine for winter use. Pkt., 10c; oz., 15c; ¼ lb., 30c; per lb., \$1.00.

Chartier. Half-long, of quick growth; color deep pink above and gradually blending into a pure waxy white to root. Pkt., 10c; oz., 15c; 1/2 lb., 30c; per lb., \$1.00



White Icicie

Radish—Winter Varieties

THESE grow to large size, have firm, hard flesh, and can be kept in good condition for use all winter by packing the roots in moist sand or soil in a cold cellar before the ground freezes in the fall. To have them crisp and free from woodiness the seed should not be planted until late in the summer, as if planted too early the roots would be apt to become hard and woody before it is time to put them away in the fall. A good rule to follow would be to sow the seed at the same time as you would plant seed for winter turnips, and where only a small supply is needed the seed should be sown in the same patch with the turnips. the turning.

Black Spanish, Oval Shape. A black valuable winter sort...Pkt., 10c; oz., 15c; ¼ lb., 30c; per lb., \$1.00. Black Spanish Long. Differs from the above only in shape. Pkt., 10c; oz., 15c; ½ lb., 30c; per lb., \$1.00. Celestial. An all-season white Radish.

Pkt., 10c; oz., 15c; ½ lb., 30c; per lb., \$1.00.

Chinese Scarlet. Half-long, fine winter sort, keeps well.

Pkt., 10c; oz., 15c; ½ lb., 30c; per lb., \$1.00.

Mammoth

White Winter. A giant white-fleshed fall Radish.
Pkt., 10c; oz., 15c; ¼ lb., 30c; per lb., \$1.00.

RHUB

One ounce will produce about 600 plants.

Linnaeus.



One Ounce Will Sow 200 Feet of Drill.

SPINAC

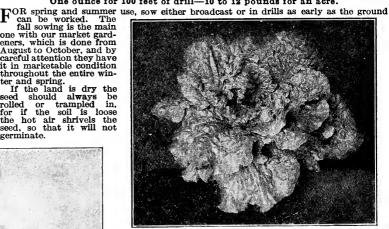
One ounce for 100 feet of drill-10 to 12 pounds for an acre.

can be worked. The fall sowing is the main one with our market gard-eners, which is done from August to October, and by careful attention they have it in marketable condition throughout the entire win-

ter and spring.

If the land is dry the

rolled or trampled in, for if the soil is loose the hot air shrivels the seed, so that it will not germinate.



McCullough's Norwood Savoy

New Zealand Spinach

Yields an abundance of the tenderest

This variety is one of the most im-McCullough's portant for market gardeners, also one of the best for the kitchen seeded variety, producing in abundance, thick, dark green, slightly crumpled leaves; in large demand for either spring or fall sowing ...Pkt., 10c; oz., 15c; ¼ lb., 25c; per lb., 45c.

Bloomsdale Savoy. The hardiest large Savoy leaved, curled and crimpled, with thick, fleshy leaves; good for family and market purposes.

Pkt. 10c; oz., 15c; ½ lb., 25c; per lb., 40c.

lana. A new spinach of the Long Season type, but leaves are more crumpled, of a darker green color. Good size, thick and of good quality. Will remain fit for use after other varieties have bolted to seed except King of Denmark. Ready to cut in about 45 days.

Pkt. 10c; oz., 15c; ½ lb., 25c; per lb., 50c.

Pkt., 10c; oz., 15c; ½ lb., 25c; per lb., 50c.

King of Denmark. This variety is superior to all others for spring planting, as it continues to grow and hold its fine quality for weeks after the other sorts have gone to seed. Makes a quick and low growth, producing an abundance of dark green leaves of large size and very much crumpled. It is ready for use as soon as other varieties and the leaves hold up remarkably well after being cut. The quality is excellent both for growing in the home garden and for market.

Pkt., 10c; oz., 15c; ½ lb., 25c; per lb., 50c.

SOUASH

One ounce of the Bush Varieties for 40 Hills, or of the Large-Seeded Kinds, 15 Hills. Two to Three Pounds of the Bush, and 3 to 4 Pounds of the Large-Seeded for an Acre.



IT IS useless to sow until the weather has become settled and warm. Light soils are best suited for its growth. Prepare hills for the seeds by incorporating 2 or 3 shovelfuls of well-rotted manure with the soil for each hill. Plant the bush varieties from 3 to 4 feet each way, and the running sorts from 6 to 8 feet. Eight or ten seeds should be sown in each hill, thinning out after they have attained their rough leaves, leaving 3 or 4 of the strongest plants, after which cultivate same as Cucumbers.

To repel the Squash vine borer put a handful of tobacco dust close around the plants.

For Yellow-striped beetle and blight, spray early and often with Bordeaux Lead Mixture or Sulfocide. Also dust with Bug Death or Slug Shot.

Summer Varieties

Mammoth White Bush. The best early variety for market or shipping. It grows to a large size; scalloped like a patty-pan.

Pkt., 10c; oz., 15c; ½ lb., 40c; per lb., \$1.25.

Early Yellow Bush. An early, flat, scallop-shaped variety; color yellow; flesh pale yellow and well flavored.

Pkt., 10c; oz., 15c; ½ lb., 40c; per lb., \$1.25.

Summer Crook-Neck. Covered with warty excrescences; color bright yellow; shell very hard when ripe.

Pkt., 10c; oz., 15c; ½ lb., 40c; per lb., \$1.25. Skin a greenish-yellow, flesh white,

Vegetable Marrow. Skin a grows 9 to 18 inches long Pkt., 10c; oz., 15c; 1/4 lb., 40c; per lb., \$1.25.

Fall and Winter Varieties

bard. Standard Winter Squash; grown more ex-tensively than any other late variety; color dark green, shell extremely hard; flesh dry, fine grained and sweet; excellent keeper. Hubbard.

Pkt., 10c; oz., 15c; 1/4 lb., 40c; per lb., \$1.25.

Warted Hubbard. This strain, without doubt, grows the finest Hubbard in existence. The wartiness indicates a very hard shell, which is one of the features in a long-keeping Squash; it also denotes extra choice quality—the harder and more warty the shell of a Hubbard Squash is, the more delicate and sweet the flesh will be found to be.

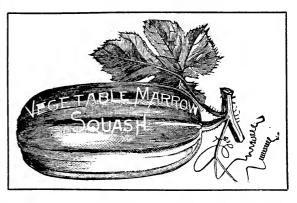
Pkt., 10c; oz., 15c; 1/4 lb., 40c; per lb., \$1.25.

Golden Hubbard. Fruit is of the same shape as Green Hubbard, and warted, but average one-half to one-third smaller in size. They are earlier in season, but keep in fine condition through the winter. The skin is deep orange-yellow and very attractive. Flesh is deep golden-yellow, fine grained and delicious. Pkt., 10c; oz., 15c; ½ lb., 40c; per lb., \$1.25.

mmoth Chili. Rich orange-yellow; flesh thick and of good quality for making pies; grows to an enormous size; a valuable sort for feeding stock.

Pkt., 10c; oz., 15c; ½ lb., 40c; per lb., \$1.25. Mammoth Chili.

Boston Marrow. A popular winter variety; quality unexcelled.
Pkt., 10c; oz., 15c; ½ lb., 30c; per lb., \$1.00.



icious. Resembles the old Hubbard, having a dark olive-green hard shell, weight from 5 to 10 lbs. For table use, it cannot be excelled, the flesh being remark-ably thick, fine-grained, sweet and of rich flavor. Delicious.

Pkt., 10c; oz., 20c; 1/4 lb., 60c; per lb., \$2.00.

dhook. A winter Squash of great merit. Of handsome bright yellow color outside and straw-yellow within. The flesh is dry and sweet. Fordhook.

Pkt., 10c; oz., 15c; 1/4 lb., 50c; per lb., \$1.50.

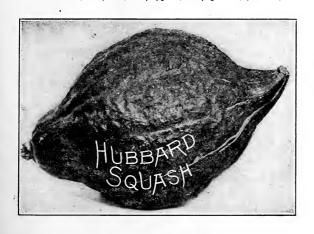


THE seed should be sown as early as possible after danger of frost is over. A good plan is to burn a quantity of brush and rubbish in the spring on the ground intended for the seed-bed, then dig and thoroughly pulverize the earth and mix the ashes, after which the seed may be sown and covered

White Burley. Extra stock, grown largely for the manufacture of fine-cut.....Pkt., 10c; oz., 50c.

Stand-Up Burley. The leaves instead of drooping have a more erect position on the plant, turning upward rather than down-hence the name "Stand-Up." It is fast becoming the most popular type of Burley and largely grown by planters in all Burley sections.

Pkt., 10c; oz., 50c.



TOMATO

One Ounce of Seed Will Produce About 3,000 Plants

S^{OW} in a hotbed, green-house or window in a sitting room, where night temperature is not less than sixty degrees, about the first week in March, in drills five inches apart and half an inch deep. When the plants are about two inches high they should be set out in boxes three inches deep, four or five inches apart, in same temperature, or removed into small pots, allowing a single plant to a pot.

They are sometimes transplanted a second time into larger pots, by which process the plants are rendered more sturdy and branching. About the middle of May, the plants may be set in the open ground. They are planted for early crops on light, sandy soil, at a distance of three feet apart, in hills in which a good shovelful of rotted manure has been mixed. On heavy soils, which are not suited for an early crop, they should be planted four feet apart. Water freely at the time of transplanting and shelter from the sun a few days until the plants are established. For late use, sow in a sheltered border in May, and set out the plants in July; the green fruit can be picked off before frost and ripened under glass. By training the tomato vines on trellises or tying to stakes, they will increase in productiveness, the fruit will ripen better, and be of finer quality. To control blight, spray with Bordeaux, and to control fungi, spray with Sulfocide.

John Baer. An early tomato; produces large, bright red, solid tomatoes and has a mild and deliciously sweet flavor. Fruit is solid and makes a good shipping tomato....Pkt., 10c; oz., 35c; ½ lb., \$1.00.

Early Jewel. This early variety is one of the best; fruit medium size, solid, bright scarlet in color, with very few seeds......Pkt., 10c; oz., 35c; ½ lb., \$1.00.

Detroit. A second early purple tomato; bears uniformly large, handsome, smooth, globe-shaped fruit of excellent quality; is also a desirable variety for shipping.

Pkt., 10c; oz., 35c; ½ lb., \$1.00.

Bonny Best. Fruit of good size, bright red color, smooth, solid and uniform. A second early and very productive. Pkt., 10c; oz., 35c; ¼ lb., \$1.00.

June Pink. Resembles the Earliana in habit of growth and shape of fruit, but the color is pink. The fruit begins to mature very early; measures 3 inches in diameter and is of excellent quality.

Pkt., 10c; oz., 35c; ½ lb., \$1.00.

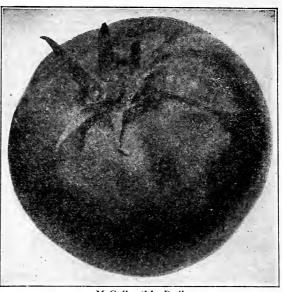
The plants are strong and vigorous, bearing an abundance of large, smooth fruit of a beautiful purplish crimson color, which is produced in clusters of four to six; is large, of perfect shape, and retains its size until late in the season. The flesh is remarkably thick, firm and solid and of the finest quality, with few seeds.

Pkt., 10c; oz., 30c; ½ lb., \$1.00.

Trucker's Favorite. One of the finest large-fruited purple sorts. The plants are of strong growth and productive. Fruit is large size, deep through, very smooth and regular, free from cracks, solid, meaty, with small seed cells and fine flavor. Pkt., 10c; oz., 35c; ¼ lb., \$1.00.

Dwarf Champion. Of dwarf, stiff, distinct, upright growth, scarcely needing support; early and prolific; smooth, medium-sized fruit of pinkish purple color.

Pkt., 10c; oz., 35c; ½ lb., \$1.00.



McCullough's Radio

Cincinnati Purple. A valuable variety, especially adapted for canning and shipping. It is very large, color a dark purplish red.

Pkt., 10c; oz., 35c; ½ lb., \$1.00.

Beauty. Rich, glossy crimson, with a slight purple tinge. The fruit grows in clusters of four to five, is of large size, very smooth, and retains its character until late in the season Pkt., 10c; oz., 35c; ½ lb., \$1.00.

The Stone. Fruit very large and deep; bright scarlet; smooth; ripening evenly to the stem without a crack; exceedingly solid and firm-fleshed; of finest quality.

Pkt., 10c; oz., 25c; 1/4 lb., 85c.

Matchless. A standard main crop, bright red variety, producing enormous crops of finest scarlet fruit.

Pkt., 10c; oz., 30c; ¼ lb., \$1.00.

Buckeye State. The large tomatoes are borne in immense clusters of four to eight. Color rich, glossy crimson, with a slight purple tinge.

Pkt., 10c; oz., 40c; ¼ lb., \$1.30.

Crimson Cushion or Beefsteak. Is very large, round and regular; bright scarlet skin, solid flesh of best quality, seed cells small. Plants are very prolific and of fine appearance...Pkt., 10c; oz., 50c; ¼ lb., \$1.50.

Ponderosa. One of the largest fruited tomatoes. The fruit is of a purplish pink color, very solid and ripens early; nearly seedless, with firm, meaty, rich red flesh; unequaled and delicious either sliced, cooked or canned; a healthy, luxuriant grower and continuous yielder from early in the season until frost.

Pkt., 10c; oz., 50c; ½ lb., \$1.50.

Golden Queen. Large, smooth fruit, of a beautiful golden color; quality excellent; attractive for slicing, and mixing with sliced red sorts.

Pkt., 10c; oz., 40c; ¼ lb., \$1.25.

Small-Fruited Tomatoes

THE following small-fruited varieties are used for making preserves, and are also quite ornamental while growing in the garden.

Pear-Shaped, Red. A small preserving tomato, of pear shape and bright red color......Pkt., 10c; oz., 40c.
Pear-Shaped, Yellow. Similar to the above in shape, but of bright yellow color.......Pkt., 10c; oz., 40c.
Red Cherry. Small, round fruit, resembling cherries; used for preserves..........Pkt., 10c; oz., 40c.

Strawberry, Winter Cherry or Husk. Low, spreading plants, bearing yellow fruit ½-inch in diameter, surrounded by a husk; for preserving. Pkt., 10c; oz., 40c.

Special Prices given to Market Gardeners and Truckers.

Wilt Resistant Tomatoes

THE loss caused by tomato wilt is increasing each year. Wilt is a fungus that lives in the soil and invades the plant through its roots. When diseased tomato vines are plowed under they only serve to increase the infection. In the early stages of the disease the leaves curl; later they turn yellow, beginning at the bottom of the plant which slowly dies, usually about the time the fruits are half grown. No amount of spraying will do any good, the only means of controlling wilt is to grow wilt resistant varieties.

Marglobe. Wilt Resistant. Very productive second-early variety. Fruits large, smooth, meaty, red, globular. It will stand up longer after it becomes flushed than any other variety of tomato. Highly resistant to wilt and somewhat resistant to blights.

Pkt., 10c; oz., 40c; 1/4 lb., \$1.25.

rvana. Wilt Resistant. This variety is commanding attention on account of its remarkable wilt-resisting qualities. A first-early red-fruited variety resembling Earliana in earliness, size, shape of fruits and in type of foliage but its fruits are usually smoother, more crimson and slightly less acid. A heavy yielder of excellent quality...Pkt., 10c; oz., 40c; ¼ lb., \$1.25. Marvana

Marvelosa. Wilt Resistant. Very productive second-early variety. Fruits medium-large, smooth, pink, globular. The foliage is of a dark green color and very uniform. Highly resistant to wilt and somewhat resistant to blights......Pkt., 10c; oz., 40c; ¼ lb., \$1.25.

Wilt Resistant. Norton was developed from the ton. Wilt Resistant. Norton was developed from the Stone, ripens at the same season, and can be classed as a wilt resistant Stone, but a more abundant bearer and the fruits are more solid. It yields a heavy crop of large smooth solid red fruits that ripen slowly, therefore, is a good keeper and a good shipper; it is also remarkably drought resistant. An excellent tomato for home garden, for canning and for the late market.

Pkt., 10c; oz., 40c; ¼ lb., \$1.25

TOMATO PLANTS are a specialty of ours. See Vegetable Plants.

TURNIP

One ounce will sow 150 feet of drill: 1 pound to the acre.

THE soil for Turnips should be rich and mellow. For an early crop, sow early in spring, in drills about a foot apart and thin out. For a general crop, sow from the first of July to the last of August, in drills 18 to 20 inches apart, and thin out the plants to 8 to 10 inches. When sown broadcast, Turnip Seed should be mixed with fine soil, sand or ashes, so as to have the seed more evenly distributed. To destroy the fly, which is very destructive to the Turnip crop, use "Hammond's Slug Shot." Should the crop be destroyed, harrow the ground immediately and sow again.

Extra Early Purple Top Milan. This variety is at least two weeks earlier than any other. It is of a handsome appearsomewhat flattened, white with purple top; flesh snow-white, fine grained and delicate flavor.

Pkt., 10c; oz., 15c; 1/4 lb., 30c; per lb., \$1.00.

Red or Purple Top, Strap-Leaf. This is the most popular variety grown for table purposes; an early, flat, white Turnip, with purple top, of excellent quality. The best variety for general use. Pkt., 10c; oz., 15c; 1/4 lb., 25c;

per lb., 75c.

Purple-Top White Globe. A variety of decided merit. Of globular shape, very handsome and of superior quality, either for the table or stock. It is a heavy producer, early, of rapid growth and an excellent keeper.

Pkt., 10c; oz., 15c; ¼ lb., 25c; per lb., 75c.

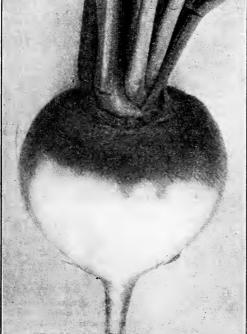
White Flat Dutch. ite Flat Dutch. An early white-fleshed variety, of quick growth, mild flavor and excellent quality. Pkt., 10c; oz., 15c; 1/4 lb., 25c; per lb., 75c.

Snowball. Extra early. A variety of sterling merit, perfectly round, early, pure white, very solid, sweet;

Pkt., 10c; oz., 15c; 1/4 lb., 25c; per lb., 75c.

Large White Globe. Flesh white, firm and crisp; a very desirable early variety.

Pkt., 10c; oz., 15c; 1/4 lb., 25c; per lb., 75c.



Purple Top White Globe

Amber Globe. A beautifully moer Globe. A beautifully formed variety, quite productive, solid flesh and attractive color. It keeps well and is desirable for either table use or for stock feeding. Pkt..10c; oz.,15c; ¼ lb.,25c; per lb., 75c.

Golden Ball, or Orange Jelly. A rapid grower, of excellent flavor, globe-shaped, bright yellow color, good keeper; a superior table or stock variety.
Pkt.,10c; oz.,15c; ½ lb.,25c; per lb., 75c.

White Egg. An egg-shaped variety for spring or fall sowing; flesh white, firm, fine grained, mild and sweet. Pkt..10c; oz..15c; ½ lb..25c; per lb., 75c.

Long White, or Cow Horn. Grows quickly, partly above ground; very productive; flesh white, fine grained, sweet; excellent quality for family and market gardeners'

Pkt.,10c; oz.,15c; ¼ lb.,25c; per lb., 75c.

even Top. Cultivated extensively in the South for the tops, which are used for greens. It is very hardy and will grow all winter. Does not produce a good root. Pkt.10c.; oz.,15c; ½ lb.,25c; per lb., 75c. Seven

Purple Top Yellow Aberdeen. A large, globe-shaped Turnip, with yellow flesh of fine qualities; a good keeper

popular for table or stock.

Pkt., 10c; oz., 15c; ¼ lb., 25c; per lb., 75c.

Swede or Rutabaga Turnip

FOR Rutabagas, sow seed in seed-bed in spring and transplant to good, warm soil, in rows at least 2 feet apart and 8 to 10 inches apart in the rows, or sow in open ground during June and early July. Take up the roots just before winter, top and store in cool cellar or pit outdoor. doors.

American Purple Top. Very hardy and productive; flesh yellow, solid, sweet; good for stock or table use.

Pkt.. 10c; oz., 15c; ¼ lb., 25c; per lb., 75c.

Long Island Improved. A uniform large rooted, quick growing, yellow fleshed sort. Pkt., 10c; oz., 15c; 1/4 lb., 25c; per lb., 75c.

BIRD FOODS AND SEEDS

Bird Pep.			
prime	condition	and prev	rents loss
of song	. Easily	attached	to cage.
			25c
		. 337.11	

Burnett's Bird Food. Will give immediate relief from the effects of moulting; eradicates all impurities from the blood, and restores to the songster, a strong and clear voice. Per bottle, 25c, (By mail 30c).

Chenoweth's Canary Food. The Birds' Balanced Ration. Keeps them in good health, song and plumage. Can 25c; (by mail 30c). Hartz Mountain Canary Cubes. A conditioner and tonic consisting of the best ingredients. Easily attached to cage. Pkg., 15c; 2 for 25c McCullough's Silver Washed Bird Gravel. 36 oz. pkg.............15c

	Per lb.
Canary Seed	20c
Hemp Seed	15c
Lettuce Seed, for birds	25c
Millet, for birds	10c
Mixed Bird Seed	
Rape Seed	
Sunflower Seed	15c
Cuttle Bone	60c

SUNDRY SEEDS

Per lb.
Celery Seed, for flavoring50c
Flax Seed
Maw or Poppy30c
Mustard Seed, black50c
Mustard Seed, white, for pickles. 50c
Pumpkin Seed25c
Watermelon Seed 25c

Prices fluctuate considerably throughout the year. The prices now quoted are those ruling as we go to press, and may be higher or lower as the season advances.

Postage must be added if wanted by mail. See Postal Rates, 2nd page of cover.

VEGETABLE PLANTS AND ROOTS

We are large growers of Vegetable Plants. Have them fresh every day in season. Special prices given on large quantities.

POSTAGE:—Prices do not include prepayment by mail or express. If wanted by mail, add for postage, 5c per dozen; 25c per 100 on Cabbage, Cauliflower, Celery and Sweet Potato Plants; 10c per dozen on Egg Plants, Pepper and Tomato Plants. Vegetable Plants, when sent via Parcel Post, travel exclusively at buyer's risk.

ASPARAGUS ROOTS

(Ready April 1st.)

DEEP, warm, rich, loamy soil, deeply and thoroughly stirred, is required for permanent bed. Use manure and fertilizers freely. Make furrows 2 or 4 feet apart and 8 to 10 inches deep. Set the two-year-old roots 18 to 24 inches apart in the bottom of furrows and cover lightly at first. Gradually fill in with soil and old compost. In early spring, fork or plow the bed shallow and carefully, or pulverize the surface by harrowing. Give clean cultivation until fall; then cover with manure or compost. Second season after planting, hill up the rows, especially for blanched "grass," and cut sparingly for use. After that the bed will give full crops. In the fall, as soon as the tops are ripe and yellow, they should be cut and burned.

2 Year Old Roots

Martha Washington. 40c per dozen; \$2.00 per 100. Mary Washington. Pedigreed. 50c per doz.; \$3.00 per 100. In the course of the next few years 90% of the Asparagus planted will be Washington.

Giant Argenteuil. A French variety of large size; green in color........Per dozen, 25c; per 100, \$1.50.

Palmetto. A large, dark green variety with pointed tips. Per dozen, 25c; per 100, \$1.50.

If wanted by mail, add 5c per dozen, 15c per 100 for postage.

CELERY PLANTS

(Ready June and July.)

McCullough's Paris Golden Yellow, Golden Self-Blanching, Golden-Hearted Dwarf, Giant Pascal. All the above, per 100, 75c.

CABBAGE PLANTS

(Ready about April 1st.)

Early Jersey Wakefield...... Per doz., 15c; per 100, 60c. Louisville Drumhead...... Per doz., 15c; per 100, 60c. Premium Late Flat Dutch... Per doz., 15c; per 100, 60c.

CAULIFLOWER PLANTS

(Ready April 1st.)

Earliest Dwarf Erfurt.....Per doz., 30c; per 100, \$2.00. Early Snowball.....Per doz., 30c; per 100, \$2.00.

CHIVES

(Ready April 1st.)

Good Clumps......10c each; per doz., \$1.00.

EGG PLANT

(Ready about May 15th.)

Black Beauty. Per doz., 50c.

HORSERADISH SETS

(Ready April 1st.)

Per doz., 25c; per 100, \$1.00. (By mail—per doz., 30c; per 100, \$1.10—postpaid.)

PEPPER PLANTS

(Ready about May 15th.)

Large Bell, or Bull Nose...Per doz., 40c.
Ruby King...........Per doz., 40c.
Long Red Cayenne......Per doz., 40c.

SWEET POTATO PLANTS

(Ready about June 1st.)

Nancy Hall and Jersey Yellow......Per 100, 50c.

TOMATO PLANTS

(Ready about May 1st.)

Transplanted plants offer many advantages over seedlings; they produce fruit much earlier and are more easily shipped.

TRANSPLANTED TOMATO PLANTS

Earliana, June Pink, Detroit, Beauty, McCullough's Radio. McCullough's Norwood, Trucker's Favorite, The Stone, Ponderosa, Cincinnati Purple, Dwarf Champion.

All the above—Per doz., 25c; per 100, \$1.75.

WILT RESISTANT TOMATO PLANTS

Marvana, Marvelosa, Marglobe, Norton. 35c per dozen; \$2.00 per 100.

RHUBARB ROOTS. (Ready April 1st.)

Linnaeus. The best Pie-Plant.

Victoria. Good for canning or cooking. Small Roots of either variety..... Each, 10c; per doz., \$1.00.
Large Roots...... Each, 25c; per doz., \$2.50.
If wanted by parcel post, add 5c each or 30c per dozen for postage.

SEED SWEET POTATOES.

Nancy Hall and Yellow Jersey. Write for prices. Ready for shipment about April 1st. For plants, see above.

For description of Seed Potatoes, see Field Seeds, etc.

SUMMER FLOWERING BULBS AND ROOTS

AMARYLLIS

PLANT in equal parts sandy loam and leaf mould. If convenient, start in hotbed, beginning with fifty degrees of heat, increasing to sixty or seventy. When the leaves appear, water carefully and not in too great quantity. The Rosea planted in May make rich and showy border plants.

Equestris. Flowers scarlet with broad, white stripes, extending from the throat to half-way up the segments...20c each; \$2.25 per dozen.

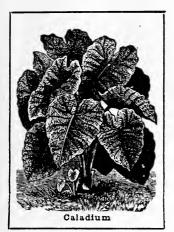
Rosea. (Zephyranthus.) Flowers all summer. Small, delicate pink. 15c each; \$1.50 per dozen.

Johnsonii. Large flower, crimson-scarlet striped with white.

50c each; \$5.50 per dozen.

Giant American Hybrids. The flowers are exceedingly rich in colors and markings, spikes are usually from two to three feet in height, bearing from three to five enormous trumpet-shaped flowers.

50c each; \$5.50 per dozen.



CALADIUM **ESCULENTUM**

(Elephant's Ear)

ONE of the most effective plants in cultivation for the flower border, or for planting out upon

the lawn. It will grow in any garden soil, and is of easiest culture. It should be planted in a rich compost, where it will obtain plenty of water. Foliage light green. (See cut.)

No. 1 Size. Small bulbs, 10c each; \$1.00 per dozen. By mail, 15c each.
No. 2 Size. Large bulbs, 15c each; \$1.50 per dozen. By mail, 20c each.
No. 3 Size. Extra large bulbs, 25c each; \$2.50 per dozen. By mail, 30c each.

No. 4 Size. Selected extra large, 35c each; \$3.50 per dozen. By mail, 45c each.

No. 5 Size. Monster bulbs, 50c each; \$5.00 per dozen. By mail, 60c each.



BEGONIAS, TUBEROUS-ROOTED

THEY are now used extensively for outdoor planting. Give them a partially shaded position in a light soil and well-drained location, and they will give more bloom than any other plant which will grow in such a place. A soil that will grow it to perfection is turfy matter scraped from the bottom of old sod-one part, and one part sand. Mix these well together, and you have a compost that is friable, porous, and well adapted to any plants having fine, fibrous roots. It is more satisfactory to apply plant-food when needed, and in such quantities as seem to be required, than to make the soil very rich from the start. Water very cautiously until active growth begins, then increase the amount. But at no time during its existence will the plant require more than enough to make-and keep the soil moist all through. Good drainage should be provided to guard against over-watering.

DOUBLE FLOWERING VARIETIES

Double. Crimson, rose, scarlet, white and yellow, in separate colors.......30c each; \$3.00 per dozen; \$22.50 per 100.

Double, Mixed.....25c each; \$2.50 per dozen; \$20.00 per 100.

SINGLE FLOWERING VARIETIES

Single. Crimson, rose, scarlet, white and yellow, in separate colors.

25c each; \$2.50 per dozen; \$20.00 per 100.

Single, Mixed......20c each; \$2.00 per dozen; \$15.00 per 100.



Amaryllis Johnsonii

CANNAS,

Select Large-Flowering

THEY do well in all sections of the country, and stand pre-eminently at the head of the list, succeeding in any sunny position in any kind of soil, but responding quickly to liberal treatment. Cannas should be planted in good, rich garden soil mixed with half of old rotten stable manure, by the end of May, when danger from frost is past. Water sparingly for first two weeks after planting. When growing freely water liberally. Should be planted about 18 inches apart each way, and if more than one kind is used be careful to plant the taller growing kinds in the center and the dwarf ones along the edge. This applies to planting in beds.

Named Varieties

Dormant Roots, as listed.

10c each; \$1.00 per dozen; (By mail, \$1.15 per dozen.)

City of Portland. The flowers are of the largest size, borne on heavy trusses. Color a glowing shade of pink, foliage rich green color. 3 ½ feet.

Eureka. The best white Canna; the large flowers are freely produced on strong vigorous plants; four feet.

Express. Bright scarlet-crimson; a good dwarf red Canna. 2½ feet.

Gaiety. Orange, mottled with carmine and edged with yellow. The tongue is yellow and densely spotted with carmine. 5 feet.

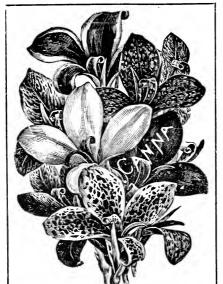
Golden Gate. The flowers open almost pure gold but soon become richly rayed with orange crimson and apricot centering to the throat. Four feet.

Humbert. Its flowers measure 6 inches in diameter, produced in gigantic trusses, a brilliant orange-scarlet with bright red markings; foliage broad and massive, of a rich, coppery-bronze; four to five feet.

Hungaria. Large flowers, borne in trusses of immense size. Color a pure La France pink with satiny sheen. The most popular pink; green foliage; three and one-half feet.

President. Flowers of immense size of a rich, glowing scarlet produced on strong, erect stalks well above the green foliage; three and one-half feet.

Richard Wallace. In color it is a pleasing canary-yellow with exceptionally large flowers, which are carried well above the bright green foliage; four and one-half to five feet.





Bosea Gigantea. Large flowers, borne in such abundance that the mass of color is amazing. A deep, rich rose, almost a coral-carmine; green foliage; four feet.

Yellow Humbert. Has the same habit of growth as the Humbert. Has green foliage and produces yellow flowers, dotted with red; four to five feet.

Mixed Tall Varieties. Our selection; dormant roots.

10c each; 75c per dozen; (By mail, 85c per dozen.)

Mixed Dwarf Varieties. Our selection: dormant roots.

10c each; 75c per dozen; (By mail, 85c per dozen.)

CANNA PLANTS

Large plants of the following varieties. Cincinnati Deep Yellow, David Harum, Hungaria, Kate Gray, Madame Crozy, Miss May Wallace, Mrs. Conard, Orange Bedder, Rosea Gigantea, The President, Wyoming, Yellow Humbert. 25c each; \$2.50 per dozen. Ready about May 10th. Sent by express only at purchaser's expense.

CALLA, SPOTTED

MADEIRA, or Mignonette Vine

A RAPID-GROWING vine, covering a large space in a short time. Fleshy, heart-shaped leaves of a light green and numerous racemes of feathery flowers of delicious fragrance....5c each; 40c per dozen.

DAHLIAS

THE Dahlia is one of the most important Summer and Autumn flowers. Commencing to flower in July, they are a perfect blaze of bloom until stopped by frost. Especially fine for cut flowers. One of the most important points in the cultivation of the Dahlia is to select a well-drained position where they will receive the full benefit of the sun during the greater part of the day. As to soil, they are not at all particular, except that in the case of a stiff clay some loose material should be added, such as coarse sand, old mortar, or anything which will make the soil loose and friable. The soil must be deeply dug, if possible to a depth of two spades, and a liberal amount of suitable plant food incorporated. For this noth-



Pink Livoni

Decorative Dahlias

MANY beautiful varieties of Decorative Dahlias have been introduced in recent years, and in the following varieties some will be found with flat petals reflexed, while others will be curiously twisted and incurved. (See cultural directions for Dahlias.)

We offer the following varieties in strong field grown clumps at 30c each; \$3.25 per dozen. If wanted by mail, add 15c per dozen for postage.

Bonnie Blue. Medium size rounded flowers, in a rich, solid color; the nearest approach to a genuine dark blue.

Break O'Day. Clear, sulphur yellow, large flowers. Clifford W. Brutton. A bright yellow variety of great merit. Strong grower and free bloomer.

Delice. Bright rose pink; extra fine, distinct.

King of Autumn. An entirely new shade of buff yellow, suffused with orange.

King of Commerce. Color a rich tango, beautifully lighted old gold and orange.

Jack Rose. Bright carmine, overlaid violet, resembling the color of the rose of the same name.

Madame Van Den Dael. A beautiful pink flowering variety that is fine for cut flowers.

Minnie McCullough. Soft golden yellow, tipped bronzy red; very effective.

Cactus Dahlias

We offer the following varieties in strong field grown clumps at 30c each; \$3.25 per dozen. If wanted by mail, add 15c per dozen for postage.

J. H. Jackson. Rich, velvety maroon, shaded black. A fine large flower and free bloomer.

Geo. Walters. Flowers of immense size. Color a rich, coppery old gold, tinting to buff at the center. Color a

Double Mixed Dahlias

Our mixtures are made from selected varieties. 20c each; \$2.00 per dozen.

If wanted by mail, add 15c per dozen for postage.

ing is more satisfactory than well-decayed stable manure, but where this can not be conveniently procured, pure bone meal, sheep manure, or any chemical fertilizer rich in ammonia and phosphoric acid will answer as a substitute.

The planting of dormant roots in the latitude of Cincinnati may be done at any time between April 25th and June 15th, the earlier planting being preferable. Plant the bulbs three inches below the surface of the ground, laying the bulb on its side. Do not crowd your plants, but plant at a distance of not less than two and one-half or three feet, and as soon as the shoots appear, remove all but two or three of the strongest, and these, when about a foot high should be secured to stout stakes.

Keep free from grass and weeds, and water regularly in dry weather.

NOTE:—We fill all orders with strong, field grown clumps, not divisions.

We offer the following varieties in strong field grown clumps at 30c each: \$3.25 per dozen. If wanted by mail, add 15c per dozen for postage.

Show or Ball Dahlias

Are perfectly full, rounded, regular form, cupped or quilled petals and solid color, or tipped darker than the ground color. (See cultural directions.)

Caleb Powers. Light pink, suffused with white.

Fire King. Flowers deep blood red, bearing a heavy mid-season crop on long, wiry stems.

Maid of Kent. A broad flowering variety of rich crimson red, sometimes splashed with white spots and stripes; free bloomer.

ade Adams. Flowers white, overlaid with soft pink. Very early and free bloomer. Maude Adams.

Pink Livoni. A clear pink, beautifully quilled, of perfect form and very free flowering. (See cut.)

Queen Wilhelmina. Peony flowered. Immense, fluffy flowers of pure white, with yellow center.

Sylvia. White, shading to soft pink on the outer petals.

White Swan. Pure white, large and fine; the hardiest and easiest grown, long stem.



GLADIOLUS

WITH its great diversity of color and splendid spikes of bloom which can be had from July until frost, the Gladiolus is pre-eminently the people's flower. Bulbs can be planted from the middle of April to July and should be set about 3 to 4 inches deep and 8 to 10 inches apart, according to the effect to be produced. Can be planted in succession for different blooming periods.

If wanted by mail, add 5c per dozen for postage. Single bulbs mailed without additional charge.

Gladioli in quantity by Parcel Post. If to be sent by this means, estimate postage at rate of 8 lbs. per 100 bulbs.

Alice Tiplady. Large flower; beautiful orange-saffron color; choice. 10c each; \$1.00 per dozen; \$6.00 per 100.

America. One of the finest varieties for cutting or bedding; color a beautiful soft flesh-pink; orchidlike in its coloring and texture; growth and habit perfect.....7c each; 50c per dozen; \$3.00 per 100.

Anna Eberius. Rhodamine purple with pansy purple blotch in throat.

10c each; \$1.00 per dozen; \$6.00 per 100.

Augusta. A lovely and useful pure white variety.
7c each; 60c per dozen; \$4.00 per 100.

Crimson Glow. Glowing crimson-scarlet, massive spikes and flowers of large size.

10c each; \$1.00 per dozen; \$6.00 per 100.

E. J. Shaylor. Splendid deep rose pink; one of Kunderd's best ruffled varieties; good cut-flower.
 10c each; \$1.00 per dozen; \$6.00 per 100.

Evelyn Kirtland. A beautiful shade of rosy pink, darker at the edges, fading to shell-pink at the center, with brilliant scarlet blotches on lower petals. Very tall spike.

10c each; \$1.00 per dozen; \$6.00 per 100.

Golden Measure. Pure golden yellow; very large flowers of good substance; robust grower and considered the best yellow on the market; a superglad.

15c each; \$1.50 per dozen; \$10.00 per 100.

Gretchen Zang. The blooms are pink, blending into

scarlet on lower petals.

7c each; 60c per dozen; \$4.00 per 100.

Halley. Large, well expanded flowers of salmon pink, lower segments blotched yellow with carmine markings.

7c each; 60c per dozen; \$4.00 per 100.

7c each; 60c per dozen; \$4.00 per 100.

Herada. The large blooms are pure mauve, glistening and clear, with deeper markings in throat.

8c each; 80c per dozen; \$6.00 per 100.

Jewell. Light salmon pink with beautiful golden yellow throat; flowers large and wide open on long slender stems; a most attractive variety, early.

10c each; \$1.00 per dozen; \$6.00 per 100.

Le Marechal Foch. Salmon pink, flaked and striped deeper at edge of petals, large flowers and beautifully ruffled....7c each; 60c per dozen; \$4.00 per 100.

Lily White. Pure white. Large flowers. Early. 7c each; 60c per dozen; \$4.00 per 100.

Louise. Exquisite shade of bright lavender, growing brighter towards center.

10c each; \$1.00 per dozen; \$6.00 per 100.

Maiden's Blush. An exquisite pink with lighter throat.

Very dainty flower on graceful spike.

10c each; \$1.00 per dozen; \$6.00 per 100.

Mrs. Dr. Norton. Silvery white base tinged with pink, deepening towards the edges of the petals, creamy blotches in throat on lower petals; tall, vigorous grower, splendid cut-flower.

10c each; \$1.00 per dozen; \$6.00 per 100.

Mrs. Francis King. A magnificent new variety. The large blooms are of a delightful light scarlet and are well placed on the large spikes, bearing six open flowers at one time....7c each: 50c per dozen; \$3.50 per 100.

Mrs. Frank Pendleton. Color a lovely salmon-pink, with brilliant deep red blotches in the throat.
7c each; 60c per dozen; \$4.00 per 100.

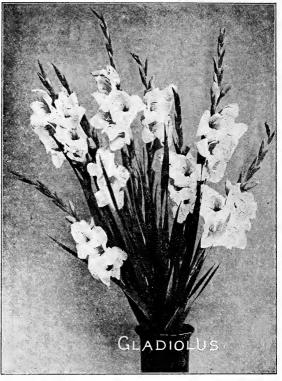
Panama. A new seedling of America which resembles the parent variety in every way except that it is a much deeper pink. A grand variety. Spike very long with flowers large and well arranged.

7c each; 60c per dozen; \$4.00 per 100.

7c each; 60c per dozen; \$4.00 per 100.

Peace. Tall, graceful spikes of large, pure white flowers with a touch of carmine in the lower petals.

7c each; 60c per dozen; \$4.00 per 100.



Princepine. An especially fine variety with large flowers of good substance. Color is a brilliant red, marked with a pinkish-white blotch and borne on strong spikes.

7c each; 60c per_dozen; \$4.00 per 100.

Purity. A pure white seedling of America, having the same habit of growth, form of flower and substance. A strong grower and free bloomer with tall, well-furnished spikes...................7c each; 60c per dozen; \$4.00 per 100.

Schwaben. Clear canary yellow, shading to soft sulphur.
Largest flower stalk and leaves of all.
7c each; 60c per dozen; \$4.00 per 100.

Primulinus Hybrids, Mixed. The flowers of this variety of Gladiolus vary in color from light yellow to orange, apricot and crimson; are of good size, borne on tall graceful spikes and plants are strong and robust. A rather late-blooming variety.

Mixed colors...6c each: 50c per doz.; \$3.50 per 100.

McCullough's Superb Mixed. This superb mixture is composed exclusively of high-grade varieties, including many new and rare kinds. It embraces the greatest possible range of color, and contains the best large-flowering sorts...6c each; 50c per dozen; \$3.50 per 100.

Extra Fine Mixed. This mixture contains a very complete range of splendid varieties, and while not as fine as the preceding, the size and coloring of many of the sorts will be found out of the ordinary.

5c each; 40c per dozen; \$3.00 per 100.

If Gladioli are wanted by mail, add 5c per dozen for postage. Single bulbs mailed without additional charge.

Gladiolus Bulbs weigh about 8 pounds per 100 and, if wanted in quantity by mail, include enough to cover postage in your remittance.

OXALIS (Summer-Flowering)

VALUABLE for edging walks, flower beds, etc. Bulbs planted three inches apart form rounded rows of delicate foliage, about one foot high, and produce flowers in endless succession.

Dieppi Alba. Pure white, very fine.

Lasandria. Fine rose-pink, beautiful cut foliage.

Shamrock. Clover-like foliage, pink blossoms. Each variety......15c per dozen; \$1.00 per 100.

LILIES

NO CLASS of plants capable of being cultivated out of doors possesses so many charms. Rich and varied in color, stately and handsome in habit, profuse in variety, and of delicious fragrance, they stand out prominently from all other hardy plants, and no herbaceous border, however select, should be without a few of its best sorts. With a well selected collection, Liliums may be had in bloom from June till October.

Culture.—They should be planted in good, rich, loamy soil, abundantly mixed with very rotten cow manure. Plant about four inches deep, and during the winter it is advisable to cover the surface of the bed with a thin layer of manure, which will not only afford a slight protection to the bulbs, but will materially enrich the soil. In spring the manure may either be removed or dug in between the rows.

Pot Culture.—The best soil to use is a rich loam, with the addition of one-third well-rotted manure. Select a large sized pot, say eight or ten inches, so as to allow of deep planting—a most essential matter where there are upper roots to protect. Dust a little charcoal about the bulb to keep it fresh, and cover at least two inches with soil.

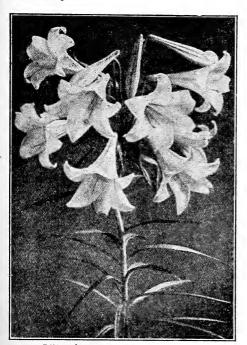
After potting, one of the most important things to observe is the proper placing of the pots containing the bulbs. Like all other bulbs, to get the best results in flowering, the pots must be filled with roots before the top starts to grow; and to do this, they must be placed in some cool place and excluded from the light, until, on examination, the roots are found to be formed around the ball of earth.

Prices on single bulbs are postpaid. By the dozen or hundred, they will be forwarded at expense of purchaser.

AURATUM. (Golden-banded Lily.) Undoubtedly one of the finest. Its large, graceful, fragrant flowers are composed of six petals of a delicate Ivory-white color, thickly studded with chocolate crimson spots, and striped through the center with a golden yellow band; 3 to 5 feet.

Large Bulbs, 8 to 9 inches, 30c each; \$2.75 per dozen; \$20.00 per 100.

Extra Large Bulbs, 9 to 11 inches, 40c each; \$4.00 perdozen; \$30.00 per 100.



Liliumi Longiflorum Giganteum



Lilium Auratum

SPECIOSUM. "Japan Lily." The varieties of this class are magnificent border plants, and also excellent for pot culture. All are perfectly hardy, and are among the most satisfactory Lilies to grow.

SPECIOSUM. ALBUM. Pure white, very fragrant.

Large Bulbs, 8 to 9 inches.

Extra Large Bulbs, 9 to 11 inches....60c each; \$4.00 per dozen; \$30.00 per 100.

Extra Large Bulbs, 9 to 11 inches....60c each; \$6.50 per dozen.

SPECIOSUM, RUBRUM or ROSEUM. White, suffused and spotted with crimson.

Large Bulbs, 8 to 9 inches.

30c each; \$2.75 per dozen; \$20.00 per 100.

Extra Large Bulbs, 9 to 11 inches

40c each; \$4.00 per dozen; \$30,00 per 100.

TIGRINUM. "Tiger Lily." Orange-salmon, spotted with black. 25c each; \$2.25 per dozen; \$17.50 per 100.

LILY OF THE VALLEY

This popular and fragrant flower should receive more attention than is usually given. Like most other plants it well repays for being well treated, and if given a liberal top-dressing of well-rotted stable or sheep manure in fall or early spring, it will show the effect by increased size and vigor of the flowers. We offer strong clumps suitable for out door planting.

50c each; \$5.00 per dozen; \$40.00 per 100; by mail, 60c each.

TUBEROSES

ONE of the most fragrant and beautiful of the summer-flowering bulbs. For flowering in the open border, plant about the first of May.

Excelsior Pearl. Mammoth bulbs. Robust stem and long spikes of flowers, which are more double and twice as large as those of the old sort....10c each; 85c per dozen; 86.00 per 100.

Dwarf Pearl. Large size. 6c each; 65c per dozen; \$4.00 per 100.

Albino. Branching single variety, early and free flowering.
6c each; 65c per dozen; \$4.00 per 100.

If you contemplate making a Lily bed, kindly give us dimensions of same, and we will be pleased to submit you an estimate, stating suitable varieties and lowest cost.

McCullough's Grass Seeds

We specialize in Grass Seeds of all kinds and for every purpose.

FOR many years Grass Seeds have been one of our most important specialties, and our improved facilities for recleaning and handling in small or car lots, enable us to offer our customers the best possible service, both as to quality and promptness in executing orders. All seeds after being recleaned are tested for both purity and germination in our well equipped laboratory, and tagged to comply with state seed laws, although as tests are subject to some variation they can not be guaranteed.

The J. M. McCullough's Sons Company has always recognized the importance of co-operation with all government agencies for the improvement of agriculture and were among the first seed houses in the United States to establish a testing laboratory which has been in constant operation for over eighteen years.

We have two or three different grades of Grass Seeds, especially of the kinds most in demand, such as Clovers, Timothy, Blue Grass, Red Top, Orchard Grass, etc. Will quote lowest market prices on application.

For best results, we advise the use of our highest brands. Our "BUCKEYE BRAND" signifies standard No. 1 Quality. Our "XXXX BRAND" signifies extra fancy quality. Our "BUCKEYE BRAND" is the average standard Number One quality produced on the crop. Our "XXXX BRAND" is extra fancy, representing the very best obtainable and as seed of this standard is sometimes only available in small quantities, our "XXXX BRAND" sells at somewhat higher price than standard Number One. We are the largest buyers in this section of high-grade Seeds and will always pay the highest market price. Submit samples and name quantity to offer.

Our prices include delivery to freight or express depots here, purchaser paying transportation charges. We make no charge for burlap bags for Blue Grass, Red Top in Chaff, Orchard Grass, Perennial Rye and other light Grass Seeds. Seamless bags for Clovers, Timothy, Fancy Red Top and other heavy Seeds and Seed Grains are 32c each, extra. The number of pounds to the bushel, in brackets is the old way of offering grasses, and is mentioned merely for reference. We expect to adhere closely to prices quoted in this list, but owing to market fluctuations, it is impossible to guarantee prices. All orders will be filled at lowest market price on the day of receipt.

Postage Must be Added if Wanted by Mail. See Postal Rates, Second Page of Cover.

A LSO known as June Grass, Green Grass, etc. This is rated as the finest permanent pasture grass. Especially suited to rich lands. It is the grass of the famous and fertile limestone soils of Kentucky, and is no less a favorite all through the Northern States. A perfect lawn grass. Sow 40 to 50 lbs. per acre for lawns, and 100 to 150 lbs. per acre for fairways. 2 bushels (28 lbs.) to the acre for pasture (14 lbs. per bushel).

Kentucky Blue Grass Seed, Fancy Cleaned.

Per lb., 45c; 5 lbs., \$2.00; 10 lbs., \$3.75; 20 lbs., \$7.25.

Write for special prices on large quantities and other grades.

ORCHARD GRASS

ROUGH Cocksfoot. Perennial. Height, 3 feet. It blossoms about the same time as Red Clover, making it, on that account, a desirable mixture with that plant. It is exceedingly palatable to stock of all kinds, and its powers of enduring the cropping of cattle commend it as one of the very best pasture grasses. Sow 25 to 35 lbs. to the acre. (14 lbs. per bushel.) Market price.

RED TOP GRASS

(Agrostis Palustris or Alba)

HERD'S Grass, Quick Grass. Perennial. Height, 1 to 2 feet. Valuable either for lawn mixtures, mixing in hay, or permanent pasture grasses; succeeds almost everywhere, but reaches its highest state of perfection in a moist, rich soil, in which it attains a height of 2 to 2½ feet.

Fancy Red Top Pure Seed.

Weight, about 30 lbs. per bushel. Sow 10 to 12 lbs. per acre for Hay and Pasture. For Putting Greens, sow 5 lbs. to 1,000 square feet. For Fairways, sow 50 to 75 lbs. per acre.

Per lb., 45c; 10 lbs., \$4.25; per 100 lbs., \$35.00.

Meadow Fescue (Festuca Pratensis)

(Erroneously called English Blue Grass).

HIGHLY valuable for permanent grass land. Does not, however, attain its full productive power till the second or third year. Relished by live stock, both in hay and permanent pasture and is one of the most desirable grasses for general culture. Sow 30 to 40 lbs. to the acre. (24 lbs. per bushel.) This is the true Evergreen Grass of the South. Price on application.

KENTUCKY BLUE GRASS Perennial or English Rye Grass (Lollum Perenne)

IMPORTED English Blue Grass. Height, 15 to 24 inches. Considered invaluable for permanent pastures. It produces an abundance of remarkably fine foliage, tillers out close to the ground and soon forms a compact sward. After being cut it grows up in a very short time and remains bright and green throughout the season, consequently is well adapted for lawn mixtures. Valuable for shady places. Also a good variety for hay, if cut when in blossom, as it is then most nutritious. Sow, if alone, 50 to 60 lbs. per acre, (24 lbs. per bushel).

Per lb., 25c; 10 lbs., \$2.25; 100 lbs., \$18.00.

NOTE—Rye Grass production is increasing in America and supplies are this season drawn from the United States. American Rye Grass contains 30 to 50% Italian Rye Grass. Seed is heavier and of higher germination than Imported Seed but essentially the same in growth.

Heavy Recleaned Short Seeded Rye Grass

SIMILAR to Pacey's. Recleaned from American grown seed. Sow, if alone, 50 to 60 lbs. per acre. Per lb., 25c; 10 lbs., \$2.25; 20 lbs., \$4.25.

South German Mixed Bent

FORMERLY called Creeping Bent, is a natural mixture of several fine bent grasses, including Rhode Island and Creeping Bent. The best turf grass for Putting Greens. Sow 5 lbs. to 1,000 sq. ft.

Per lb., \$1.25; 5 lbs., \$6.00; 10 lbs., \$11.75.

NOTE—Pure Creeping Bent turf cannot be secured from German Bent Seed, but may be produced from the American Creeping Bent (Seaside Bent) seed, or from planting Creeping Bent Stolons. Two popular strains of Creeping Bent (Washington and Metropolitan) are produced from stolons only.

Information and prices of Stolons on request.

American Creeping Bent, (Seaside Bent)

(Agrostis Maritima)

A pure strain of Creeping Bent grown in the United States. Should produce a green equal to one planted from stolons at a fraction of the cost. Sow 3 to 5 lbs. to 1,000 square feet. 1 lb., \$2.50; 3 lbs., \$7.25; 5 lbs., \$11.50.

Rhode Island Bent

A pure strain grown in Canada. Full bags sealed by the Canadian government. We suggest that 5 to 10% be included in Fairway mixtures. Per lb., \$1.25; 5 lbs., \$6.00; 10 lbs., \$11.75.

GRASS S E E D S—Continued

Awnless Brome Grass (Bromus Inermis)

A HARDY perennial, standing extremes of heat, cold and drought. In the south it remains green all winter. It will grow well on all kinds of soil. The seed should be sown as early in the spring as the ground can be worked. (10 lbs. per bushel). Sow 25 to 30 lbs. to the acre. Market price.

Bermuda Grass (Cynodon Dactylon)

A VALUABLE grass for the south and for tropical climates; will not endure frost. Sow 10 to 15 lbs. per acre. Write for price.

Canadian Blue Grass (Poa Compressa)

A LSO called Flat-Stemmed Poa, Flat-Stalked Meadow
Grass. Grows a foot or more high. Recommended for
horses, cows and sheep. Thrives well on clay. Sow
30 to 40 lbs. per acre. Market price.

Sheep's Fescue (Festuca Ovina)

Perennial. Height varies from 6 to 20 inches. Grows naturally on light, dry, sandy soils. Sheep are very fond of it. Used in the rough on golf courses. (14 lbs. per bushel.) Sow 30 to 35 lbs. per acre......Per lb., 50c; 10 lbs., \$4.50.

Hard Fescue (Festuca Duriuscula)

Similar to Sheep's Fescue. Used in the rough on Golf res. Per lb., 50c; 10 lbs., \$4.50.

Italian Rye Grass (Lolium Italicum)

A NNUAL. Height, 18 to 30 inches. As it is not perennial, it is not adapted for permanent pastures, but for one or two years hay it is unsurpassed. Sow, if alone, 45 to 50 lbs. per acre. Used in the South as a winter grass for Putting Greens. (18 lbs. per bushel.)

Per lb., 30c; 10 lbs., \$2.75; 100 lbs., \$18.00.

Rough Stalked Meadow Grass

(Poa Trivialia)

No Grass is better adapted for pleasure grounds, particularly under trees, as it will not only grow in such places, but forms a fine sward where few other Grasses can exist. A fine grass for dry ground under Bay windows, overlapping roofs and shady side yards. Sow 20 to 25 lbs. to the acre.....Per lb., 85c; 5 lbs., \$4.50; 10 lbs., \$7.50.

Red or Chewings Fescue (Festuca Rubra)

A CREEPING-ROOTED species, forming a close and lasting turf and especially adapted for dry sandy soils. It resists extreme drought and thrives on poor soils; also valuable for shady places in lawns as well as for golf-courses and particularly on Putting Greens. Another fine grass for dry ground under Bay windows, overlapping roofs and shady side yards. 40 lbs. to the acre. On Putting Greens sow 8 lbs. to 1,000 square feet. (24 lbs. per bushel.)

Per lb., 50c; 10 lbs., \$4.50.

Tall Meadow Oat Grass (Avena Elatoir)

A perennial. Has broad, flat leaves, and grows about 3 feet high; has an abundance of long, fibrous roots, penetrating deeply in the soil, enabling it to withstand drought and cold. Sow 25 to 30 lbs. per acre.

Market Price.

Timothy (Phleum Pratense)

Herd's Grass. Cat's-tail Grass. This Grass stands at the head for meadows. Never use less than a peck to the acre, then up to one-half bushel, as to circumstances. Market Price.

Wood Meadow Grass

Used in shady places, but now displaced to a large extent by Rough Stalked Meadow Grass. Market Price.



McCULLOUGH'S MIXED GRASSES For Meadows and Pastures

A FTER years of experimenting we have aided largely in establishing the fact that a thicker and more prolonged growth is produced by a mixture of several varieties than when only one or two are used. There are always certain Grasses that are especially adapted to certain kinds of soils, and these are so carefully combined in our mixtures that in our Mixture for Permanent Pastures, grasses will be found that mature at intervals during the season, thereby insuring continuous pasturage, while our Mixture for Permanent Meadow will furnish excellent hay as well as late pasturage. We are prepared to furnish seeds adapted to all soils and all situations, and for all purposes, composed of Grasses for light, medium or heavy soils; by light soil we mean that which is more or less of a sandy or gravelly nature; the heavy, clay and heavy loams; while the medium is an intermediate between these two. A light, wet soil, with respect to the Grasses suited to it, may be considered same as to the heavy soils, and a dry, heavy soil, more as to light soils.

Our best mixture is made entirely with our choice recleaned seeds, while in our second quality we use the same seeds, but without as thoroughly recleaning and quality will be equal to seed usually to be had on the market. Quantity to be used per acre, 25 to 30 pounds, and half this quantity for renovating. In ordering, always state the soil and position on which you wish to use it and whether you wish Sweet Clover included in mixture.

First Quality Mixtures

For Meadows
Per lb., 40c; 10 lbs., \$3.90; 20 lbs., \$7.60; 100 lbs., \$35.00.
For Permanent Pasture
Per lb., 40c; 10 lbs., \$3.90; 20 lbs., \$7.60; 100 lbs., \$35.00.
For Pasture and Hay in Orchard
and Other Shady Places
Per lb., 40c; 10 lbs., \$3.90; 20 lbs., \$7.60; 100 lbs., \$35.00.

For Marshy Grounds Per lb., 40c; 10 lbs., \$3.90; 20 lbs., \$7.60; 100 lbs., \$35.00.

For Sandy and Rocky Grounds Per lb., 40c; 10 lbs., \$3.90; 20 lbs., \$7.60; 100 lbs., \$35.00. Postage must be added if wanted by mail. See Postal Rates, Second Page of Cover.

We supply SECOND QUALITY MIXTURES of any of the above at a reduction of 2c per pound. We specialize in Grass Seeds of all kinds and for every purpose. For larger quantities—write for special prices.

Prices fluctuate considerably throughout the year. The prices now quoted are those ruling as we go to press, and may be higher or lower as the season advances.

Postage must be added if wanted by mail. See Postal Rates, 2nd page of cover.

McCullough's High-Grade Clover Seed

Where prices are given on Field Seeds they only represent market values at time of going to press. Purchasers of large quantities should write for latest prices. Grain bags, holding two bushels, 32c each, extra. Postage must be added wanted by mail.

OUR "Buckeye Brand" Clovers and Timothy Seeds furnished, if desired, in one bushel sealed bags at 30c per bushel over prevailing market prices. Bags free, net weight when packed.

Alfalfa, or Lucerne (Medicago Sativa)

A LFALFA is one of the most profitable crops the dairyman or stock farmer can raise, due to the high yield of palatable hay which contains a large percentage of protein. Alfalfa as grown in the United States yields more than twice the digestable nutriments that Red Clover does and more than three times the digestable protein to the acre. Alfalfa and corn make a perfectly balanced ration. Many farmers are using it in their rotation to take the place of Red Clover. This practice is satisfactory where the soil contains a large supply of lime and organic matter and the seed has been inoculated, or the land has been in Alfalfa previously.

Alfalfa is best adapted to steep limestone hill-sides and gravelly river bottoms, where the water can get away from the roots. Will grow on acid soils provid-ing the water is drained off and sufficient lime is added to correct the acidity.

Seeding Alfalfa

The ground should be plowed in late fall and worked in spring once or twice to kill the weeds. If the land is acid it should be limed at the rate of three tons ground limestone to the acre. With a Wheat drill sow 15 to 20 lbs. of inoculated Alfalfa seed to the acre any time between April 15th and May 10th. Apply 400 lbs. of a good high grade fertilizer, carrying a small per cent of ammonia and high per cent of phosphorus to the acre. If land is to be seeded following early potatoes, work ground up with disc and drag down. Sow seed the same as in spring. Where land is being seeded to Alfalfa for the first time it will pay to inoculate the seed with Nitragin for Alfalfa. The bacteria will be present and if there is not enough available nitrogen present they will gather the nitrogen from the air and supply your young plants, thus insuring a good stand.

We handle only seed which to the best of our

We handle only seed which to the best of our belief is adapted to this section. We do not handle Southwestern seed.

Grimm Alfalfa

This variety of Alfalfa is being raised all over the United States. It seems to be much hardier than common Alfalfa, partly due to its root system, which is somewhat variable, enabling it to withstand freezing and thawing weather, droughts and other hardships which the common alfalfa will not endure.

Genuine Ontario Grimm from fields of the original Lyman Grimm strain is giving fully as good satisfaction and is lower in price than North-Western seed.

We handle both North-Western and Ontario Grimm Alfalfa.

To secure a stand the following requirements are essential—good seed bed, limestone soil, or addition of 3 bed, innestone soil, or addition of 3 tons of fine ground limestone per acre, inoculation of seed, and plenty of available plant food. Sow in the spring or fall of year at the rate of 10 to 15 lbs. per acre. Prices Prices on application.



Canadian Variegated Alfalfa

This is considered by many to be fully as hardy as Grimm and is of the Grimm type.

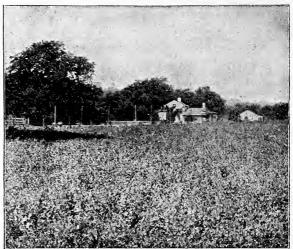
We recommend it very highly and it can be obtained at a small advance in price over common Alfalfa.

In Ohio, Grimm or Canadian Variegated Alfalfa is the best insurance against winter killing and thinning out of stands.

Where winter killing is not a factor, common Alfalfa from Utah and sections north gives satisfaction.

A long series of tests shows no difference in yields of the different varieties.

Write for special literature on Canadian Variegated and Ontario Grimm Alfalfa.



View of a Field of Alfalfa Clover

Crimson, or Scarlet Clover (Trifolium Incarnatum)

Crimson, Scarlet or Carnation Clover

THIS Clover is grown in Italy, France, Great Britain and other European countries. Was introduced into this country in 1822 and has proved especially adapted to the light sandy soils of the Eastern and Southern parts of the United States. Largely used as a cover crop in

orchards.

Crimson Clover should be seeded shallow in August on a moist, reasonably fertile, well drained, well settled seed bed. Inoculation is essential when seeding the first time.

Crimson Clover makes a good cover crop to be sowed on potato fields after the potatoes are dug. It makes a good growth in the fall and early spring and may be plowed under for potatoes the following spring.

It may be seeded alone following any farm crop which can be removed from the land by early summer, so that seed can be sown in late summer or very early fall. It may also be seeded for hay in mixture with grain such as Wheat, Rye, Barley, or Winter Oats, which are ready to cut for hay at about the same time as the Clover the following spring.

Apply seed at the rate of 12 to 15 lbs. per acre.

Prices on application.

White or Dutch Clover (Trifolium Repens)

Alsike or Swedish Clover (Trifolium Hybridum)

This variety is perennial and on account of its fibrous root system does not winter-kill. Will grow well on poor soil, and will do better on moist land than any other variety of Clover. It is a valuable acquisition to the forage plants of this country and is highly esteemed as pasturage for bees. Sow 6 to 8 lbs. per acre. Market price.

Japan Clover (Lespedeza Striata)

THIS Clover is especially adapted for the South because it occupies the same position in pasture mixtures in the South that White Clover does in the North. Will thrive on poor land, and as it grows thickly, soon furnishes abundant pasturage. Good stands have been secured by simply sowing the seed broadcast during late winter or early spring at the rate of 10 to 12 lbs. per acre. This Clover is a half-hardy annual without any objectionable root system. Sow 10 to 12 lbs. per acre. (25 lbs. per bushel.)

Per lb., 35c; 10 lbs., \$3.25.

McCULLOUGH'S HIGH-GRADE CLOVER SEED

Bokhara or Sweet Clover

SWEET CLOVER is a biennial plant, which closely resembles Alfalfa. It requires practically the same soil treatment as Alfalfa, but will grow under a wider variation of soil conditions than Alfalfa. Sweet Clover produces 150 to 250 lbs. of Nitrogen to the acre. 3 to 6 tons of Hay or Organic Matter to the acre and is equal to 20 tons of Manure to the acre. Three things are essential—lime, inoculation and scarified seed. If the land has raised Alfalfa previously, then the addition of lime may not be necessary. Inoculation with Nitragin tends to insure a stand, by securing nitrogen for the young plant at a time when it needs it the most. Scarified seed is seed that has been so treated as to scratch or crack the hard coating and make it easy for moisture to penetrate and hasten germination, thus insuring a stand. Sweet Clover gathers nitrogen from the air and stores it up in the soil for the use of future crops.

low Flowered. (Melilotus Officinalis.) Is a biennial producing seed the second year, and will reseed itself if left undisturbed. It is the variety which is best adapted for hay, as it blossoms three weeks earlier than the White Sweet Clover, has a finer stem and does not grow so tall. It makes excellent pasture where 10 to 15 lbs. of seed is mixed with 6 lbs. of Timothy sowed in Wheat or Rye, then pastured in the fall. The following spring the Sweet Clover will be three weeks earlier than any other grass, thus making a fine early pasture. When sowing unhulled seed in the fall with wheat for hay, apply 10 to 15 lbs. per acre. Do not sow unhulled seed in the spring and expect results the same year. Yellow Flowered.

Yellow Flowered, Unhulled Seed. Prices on application.

Yellow Flowered, Hulled Seed, Scarified. Prices on application.

te Flowered. (Melilotus Alba.) Is a biennial producing seed the second year, and will reseed itself if left undisturbed. The White Sweet Clover is much coarser than the yellow, and is especialwhite sweet Clover is much coarser than the yellow, and is especially well adapted for soiling purposes. Many farmers are taking advantage of this crop in the bottoms where annual flooding prevents the use of Red Clover in a crop rotation, corn being planted year after year with an occasional crop of wheat. Scarified seed which has been inoculated is sown at the rate of

seed which has been inoculated is sown at the rate of 15 lbs. per acre in the corn at the last cultivation. This makes a growth of 10 to 15 inches by the time the corn is husked off of the stalk in the fall, and is plowed under late the following spring for corn.

It is being widely used where farmers wish to shorten their crop rotation and secure a crop of hay. To do this, sow scarified seed which has been inoculated with Nitragin in the Wheat, from the middle of April to the 1st of May, at the rate of 15 lbs. per acre. The following September as much as one ton of hay per acre may be cut from this land and the next May the second growth may be turned under for corn. May the second growth may be turned under for corn. The Sweet Clover, being young and tender, rots early and forms a mulch which holds the water, thus making ideal conditions for a good corn crop. Farmers can ideal conditions for a good corn crop. Farmers can increase their yield of corn from one-third to one-half using Sweet Clover as a green manure crop.

White Flowered, Unhulled Seed. Prices on application. White Flowered, Hulled Seed, Scarified.

Prices on application.

Unhulled Seed of both varieties is very slow to germinate. Unhulled Seed (30 lbs. per bushel.) Hulled Seed (60 lbs. per bushel.)

NOTE:—We have installed scarifying machinery and our Hulled Sweet Clover is all scarified, which increases the germination 40 to 50 per cent.

Red Clover-Medium

(Trifolium Pratense)

SOW 10 to 12 pounds to the acre. according to quality of seed used and condition of the soil. Write the United States Department of Agriculture, Washington, D. C., for Farmers Bulletin No. 1365 on Clover Failure. Every farmer should be familiar with information contained in this valuable booklet. Nothing takes the place of Red Clover on land adapted to it. In ordering, always state quality desired, otherwise will send the best. Market price.



Hubam Clover (Annual White Sweet Clover)

The advantage of Hubam over other clovers is its remarkable vigor and its value as a hay, green manure and pasture crop.

It also affords splendid pasturage for bees, as it blossoms early and continues in blossom till the first frosts.

By its use a full year is saved in the farm rotation. It will grow on a wide variation of soils and under various climatic conditions, but thrives best in limestone soils that are not acid.

Hubam will not benefit the soil upon which it grows without inoculation, except on soil that has previously grown Alfalfa or Sweet Clover.

Hubam may be sown in our latitude about the first of April.

If planted in drills 18 to 30 inches apart, use 2 to 4 pounds per acre. If sown broadcast, use 12 to 14 pounds per acre. May be sown in grain, but makes a better yield when sown alone.

Never sow unscarified Hubam Seed, as the germination is low, when scarified will germinate as high as 90%. All of our Hubam Seed is scarified, quality is genuine and crop of 1927.

Write for special prices and descriptive circular giving more detailed information.

Red Clover—Sapling or Mammoth (Trifolium Fratense Perenne)

Also called English Clover, Cow Grass, Perennial Clover. Sow 10 to 12 lbs., per acre. Market price. Red Clover.

INOCULATION

Those who analyze the matter will be made aware of the fact that inoculation of Clover Seed practically costs nothing, because when inoculated seed is sown the smallest quantity specified will be sufficient; the saving in cost being represented by the symmion cost. in cost being represented by the saving in seed.

Inoculate Alfalfa and Other Clovers and Vetches with Nitragin



NITRAGIN is an old, reliable inoculator. The contents are always fresh, living bacteria to feed your plants. Easy to use. Sent by mail or express, prepaid.

For Alfalfa, Clove	r, Vet	ch, Peas	and Beans
1/4 bushel size (15	lbs. of	Seed)	\$0.40
½ bushel size (30	lbs. of	Seed)	0.60
1 bushel size (60	lbs. of	Seed)	1.00
5 bushel size (300	lbs. of	Seed)	4.75
	-	-	

State What Nitragin For.

For Soy Beans and Cow Peas

	1/2	bushel	size	(30	lbs.	of	Seed)	.\$0.40
i	1	bushel	size	(60	lbs.	of	Seed)	. 0.70
į	5	bushel	size	(300)	lbs.	of	Seed)	2.50

In ordering, be sure to name crop to be inoculated.

Price on cheaper grades given on application. For larger quantities—write for special prices.

FARM, FIELD, FORAGE AND SILO SEEDS

WE give special attention to the quality of our FARM SEEDS and can furnish best quality of recleaned stocks. This fact should be borne in mind when making comparisons of prices.

For best results, we advise the use of our highest brands, Our "BUCKEYE BRAND" signifies standard No. 1 quality. Our "XXXX BRAND" signifies extra fancy quality. Our Buckeye Brand is the average standard number one quality produced on the crop. Our XXXX Brand is extra fancy, representing the very best obtainable, and as seed of this standard is sometimes only available in small quantities, our XXXX Brand sells at somewhat higher price than Standard Number One.

Trade Marks registered, McCullough's Seeds, XXXX, Buckeye, Suburban Lawn Grass, Central Park Lawn Grass.

The prices quoted are subject to market fluctuations. When customers are in need of large quantities, we will be pleased to submit samples and quote, on application, the lowest prices that the market will justify at the time. Please specify quantities when writing for prices. Grain Bags, holding two bushels. 32c each, extra.

Postage Must be Added if Wanted by Mail, See Postal Rates, Second Page of Cover.

of Cover.

Tennessee, or Southern German Millet

Far superior to Western grown. Will grow in any climate or soil, and make a large yield of most nutritious feed. Sow not less than 50 lbs. per acre, at any time between May 1st and June 15th. Cover with a single stroke of a light harrow, or roll without harrowing, or it may be sown with a wheat drill, barely covering the seed. Cut the crop while in bloom, before the seed hardens. We have secured a full supply of Tennessee, or Southern German Millet (cultivated seed), which we know will give the best satisfaction. Sow one bushel per acre (50 lbs. per bushel). Write for Special Quotations.

Northern or Western German Millet

Does not yield so much hay nor so good hay as the Southern German Seed. Sow about a bushel to the acre. (50 lbs. per bushel.) Write for Special Quotations.

Hungarian Millet (Grass)

A valuable forage plant of the Millet family, but not so coarse. Sown and cultivated same as Millet. Quite a favorite with stockmen. It is of fine growth, and makes an excellent hay. Sow 14 bushel per acre. (50 lbs. per bushel.) Write for prices.

Japanese Barnyard Millet

Sometimes called Billion Dollar Grass. It has proven an enormous yielder in all sections of the United States, producing hay and fodder of most excellent quality and growing on any soil. It grows to a height of 6 to 8 feet and produces from 12 to 30 tons per acre. Cattle and horses eat it greedily and fatten rapidly. It is a remarkable stooler and should not be sown very thickly—15 pounds per acre broadcast being sufficient. In drills 3 pounds per acre. (35 pounds per bushel.) Market price.

Hog Millet

Known also as Broom Corn Millet. The name Hog Millet has been applied to emphasize the use to which it is now being put as a valuable food for hogs; also good food for birds and poultry. Sow one bushel per acre. (50 lbs. per bushel) per bushel.)

Kafir-Corn

A Great Fodder Crop. The Finest Grain for Poultry and Pigeons.

White Kafir-Corn. The stalks keep green, making excellent fodder. The seed heads form at the top of each stalk, and as soon as these show the grain well, the joints next below the top send up shoots, which yield the second seed heads. For grain sow in rows 3 feet apart; 5 lbs. of seed to the acre. For fodder sow 5 to 15 lbs., either broadcast or in drills. (50 lbs. per bushel.)

Broom Corn

Improved Evergreen. The best variety for general cultivation on account of the color and quality of brush. Ripens early; about 8 to 10 feet high; brush of good length, fine and straight, and always of green appearance when ripe. Plant 30 to 35 lbs. to the acre. Per lb., 20c; 10 lbs., \$1.50.

Barley

Barley needs a rich land, more sandy and lighter than that adapted to Wheat, and can be grown farther North than any other grain. It should be cut before fully ripe (unless intended for seed), as it is then better quality and less liable to shell. Sow 1½ to 2 bushels if drilled; 2 to 2½ bushels broadcast. (48 lbs. per bushel.) Spring Barley. Market price.

Beardless Barley. Market price.

Buckwheat

In this locality it is sown anywhere from June 1st to July 15th; one bushel of 50 lbs., broadcast, to the acre. It makes a very fine quality of flour; is largely used for poultry food and frequently yields as much as 80 bushels to the acre. (50 lbs. per bushel.)

Japanese. This superior variety is earlier, more prolific and yields double the weight per acre of other sorts. The grains are nearly twice as large as those of Silver Hull, and of fine color. Market price.

Silver Hull. The grain is of light gray color. Market price,

Tennessee, or German Golden Millet Sudan Grass (Andropogon Sorghum)

A sweet heavy-yielding grass, foliage and seed resembles Johnson Grass, but is an annual. Root system is like Oats. Seeds from 300 to 400 pounds per acre from Florida to Montana. Absolutely drought-proof. Grows 6 to 10 feet high. Stems erect, unbranched, very leafy and three to four cuttings, 4½ to 6½ tons per acre of dry, sweet hay that cattle prefer to Cow Pea Hay. Ripe for hay cutting in 70 days, and cut every 30 days following. Plant from March to July in 18 to 30 inch rows, 5 pounds to acre, or broadcast 10 pounds. Each seed stools wonderfully—20 to 40 stools per seed.

NOTE:—On account of the similarity of this seed to Johnson Grass Seed, we have gone to a great deal of trouble and expense to procure seed that we have every reason to believe is free from this seed.

There are all kinds of Sudan Grass Seed on the market, and on this account you should be doubly careful. Buy your seed from a reputable house at a reasonable price. Price on application.

Sorghum or Sugar Cane

Plant in drills $\frac{1}{2}$ to 1 bushel; broadcast, 1 to $1\frac{1}{2}$ bushels to the acre. Sorghum is being used extensively as a green food for cattle, horses and mules. (50 lbs. per bushel.)

ly Orange Cane. A strong grower; much more juicy than any other variety. The stalk is heavier and a little later than the Amber. Write for prices. Early Orange Cane.

Early Amber Cane. This popular and well-known variety is the earliest and makes the finest quality of both sugar and syrup. Write for prices.

Speltz or Emmer

This grain resembles wheat, but is a much larger yielder, producing frequently as high as 80 bushels of grain per acre, and that on the poorest land. The hay, if cut green is desirable for horse or cattle feed, while the straw after thrashing, is equal to the best wheat straw.

The heads are somewhat similar to two-rowed barley. For fattening cattle, poultry, horses, sheep, pigs, etc., it is claimed to be ahead of any other grain. Cultivation similar to wheat or oats. Sow at the rate of 50 to 60 lbs. per acre. Price on application.

Write for Special Prices on Corn and Farm Seeds. Seamless 2-Bushel Bags, 32c Each.

FARM, FIELD, FORAGE AND SILO SEEDS-Continued

SOY, OR SOJA BEANS

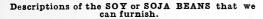
The Great Land Renovator

The King of Summer Forage Crops

THIS very valuable farm plant enriches the ground in which it is planted by the free nitrogen gathered from the air and which is deposited in the ground by the roots, leaving it in ideal condition and rich in nitrogen for the next crop. Fodder is relished in either green or dry form by cattle

the ground by the roots, leaving it in ideal condition and rich in litrogen for the next crop. Fodder is relished in either green or dry form by cattle and dairy cows.

The Soy or Soja Bean is an annual. Its character or growth resembles ordinary field beans. During the past few years the United States Department of Agriculture and State Experiment Stations have tested many varieties of Soy Beans and pronounce them forage and grain plants of great promise. They are grown chiefly for hay, grain, silage, soiling, pasture and as a soil renovator; are not hard to grow, not exacting to the character of soil and a valuable plant for forage; some claim they have a higher protein content than Alfalfa. These beans should not be seeded until all danger of frost is past and the ground is thoroughly warmed, and are usually sown from the middle of May until July. It is best to plant Beans only about one or two inches deep, or as shallow as moisture supply will permit, for the forming of a crust may prevent the beans from growing. If grown for sed or silage in drills 24 to 30 inches apart, sow about 3 pecks per acre. If grown for hay or soiling, the foliage will be of a finer quality and be consumed with less waste; drilled solid, or sown broadcast, using from 1½ to 2 bushels per acre. For hay, cut when pod begins to form. For grain, cut just before beans are ripe, or when pods are beginning to take on a brownish or black appearance. For silage, cut as near maturing as possible without dropping the leaves. Will Quote Prices on Application.



Southern Grown

Mammoth Yellow. One of the oldest and best known varieties, producing a large hay crop and giving good satisfaction at all times. A fine fertilizer when plowed

Northern Grown

nchu. One of the very highest seed yielding beans. Analysis of this seed almost invariably shows it to be at the top or very near the top in oil content. It matures as far as north-western Minnesota. Has been planted as late as July in central Illinois and has matured and made seed. One of the good points of Manchu is that, although it is early, it is high yielding. These two qualities usually do not go together. In handling Soy Beans in the central west, any variety that matures in time to be taken off the ground early enough so wheat can be planted, is a good variety. Manchu certainly is this. Juest or Hollybrook. These two strains are now inspections. Manchu.

Midwest or Hollybrook. These two strains are now included in the general term "Midwest". The Midwest runs very high in oil content and the bean is one of the most popular grown and will continue to be until some of the other varieties, such as Manchu, become

better known.

Wilson Black. Plants slender, erect, with average height of three feet on good ground. Stands up well and makes pods a good distance from ground and retains its seed. Matures in 120 to 130 days. Seeds black. One of the best for hay and beans.

Ebony Black. Similar to Wilson Black but shorter in growth.

Virginia Brown. On account of its abundant growth and large yield of Beans this variety makes excellent hay and ensilage. One of the best hay varieties.

Vetch or Tares

THIS has been used in Europe for many years as a stock food and green manuring or cover crop. It fertilizes the ground without further trouble or cost, on account of the free nitrogen it gathers from the air. It produces a peculiar vine plant with very narrow foliage and elongated flowers of pinkish white in clusters. The height when supported is frequently 4 feet.

Sand, Hairy, or Winter Vetch. (Vicia Villosa.) Our stock of this is the true type, which will absolutely live throughout the winter, and buyers should beware when buying that they procure the right article, which is a small, round, black seed; this is far superior to Crimson Clover, as it never winter-kills. Sow from August 1st to October 1st, broadcast, 1 to 1½ bushels per acre, to which we suggest adding half a bushel of winter rye or wheat. In the spring it can be plowed in as green manure, or when in flower cut for hay. All stock relish it keenly. (60 lbs, per bushel.) Write the U. S. Dept. of Agriculture for Farmers Bulletin No. 515 on Vetches.



$\mathbf{C} \mathbf{O} \mathbf{W}$ PEAS

The Great Soil Improver—Makes Poor Land Rich—Makes Good Land More Productive.

The Great Soil Improver—Makes Poor Land Rich—Makes Good Land More Productive.

OW PEAS make one of the largest yielding and most nutritious forage crops grown. There is also no surer or cheaper means of improving and increasing the productiveness of your soils than by sowing the Cow Peas. There is a wide difference between Cow Peas and Canadian Peas. Bear in mind that the Southern Cow Peas belong to the Bean family, therefore must not be sown until the ground is thoroughly warm and all danger from frost is past. The value as a fertilizing crop exceeds that of clover, for, in addition to being a larger nitrogen gatherer than the clover, they draw from the subsoil to the surface large amounts of potash and phosphoric acid, thus putting the soil in most excellent condition for following crops. The feeding value of Cow Peas is very high, being considerably above that of Red Clover. The yield of green vines per acre runs ordinarily from 5 to 15 tons.

Sow 1½ to 1½ bushels per acre, on land thoroughly pulverized and disc or plow with a cultivator or double shovel plow. If wanted for hay, cut when peas are forming; cure as clover. If peas are for fertilizer, sow same quantity after same preparation as for hay; turn under when peas are in bloom. If farmers will first roll and disc peas they will turn under much easier and be more satisfactory. For a fertilizer, expecially to be followed by wheat or corn, they are simply the best.

Will Quote Prices on Application. All orders accompanied with the money will be filled at the lowest market price, upon receipt.

Whip-Poor-Will. An early variety, tall, upright, medium

whip-Poor-will. An early variety, tall, upright, medium yield of vines, large yield of peas, for which they are particularly grown. Highly recommended for "hogging down".

particularly grown. Highly recommended for "hogging down."

Clay. The leading variety in the South. Large yield of vines and peas, but require longer season to mature than the former-named varieties.

New Era. Seed small, dun colored; earlier than Whip-Poor-Will, but more trailing in habit. A great favorite in many places.

Mixed Cow Peas. These are splendidly adapted for those who merely wish same for feeding purposes, and being mixed, we are able to offer them at a lower price.

Canada Field Peas

THESE are sown with oats about April ist at the rate of 1½ bushel of Peas and 1½ bushel of Oats to the acre either drilled or broadcast. The oats are intended as a support for the peas. They are cut just after the peas flower and fed green; sheep, hogs and cattle relish them keenly. They may be sown successively up to July if one has the available land. Peas may also be sown alone at the rate of 3 bushels per acre and furnish excellent pea hay. For plowing under as green manure, they add a vast amount of nitrogen to the soil, and succeeding crops, particularly wheat, are wonderfully benefited. The dried peas are extensively fed to pigeons, while when ground as meal is an excellent addition to the regular soft food of cows. Sheep and horses. (60 lbs. per bushel.)

Per lb., 15c; 10 lbs., 85c;



FARM, FIELD, FORAGE AND SILO SEEDS—Continued

Dwarf Essex Rape

Dwarf Essex Rape

A FORAGE plant of highest value. It can be sown in April for an early crop, and for fall crop in July, August and September, and still later further South, in a few weeks from the time of sowing, sheep, hogs or cattle can be turned on it. Under favorable conditions Rape is ready for pasturing sheep or cattle within six weeks from time of sowing, and on an average one acre will carry 12 to 15 sheep six weeks to two months. When on the Rape they should at all times have access to salt. Pigs and cattle are also very fond of it. Rape has a high feeding value. It is excellent for fattening sheep and swine, produces an abundant flow of milk in cows, and is the ideal pasture for weaning lambs. Its value as sheep pasture has been demonstrated in every State in the Union, and it is recommended by authorities everywhere as of superior value for hogs, furnishing the

Postage Must be Added if Wanted by Mail. See Postal Rates, Second Page of Cover.

FIELD CORN

Northern Grown Seed

OUR strains of Corn are not the common kinds usually found in abundance on the market; we pay special attention to the selecting of stocks in all lines of farm seeds. This is particularly true of Field Corn where reselection means the limit of crops with little or no increase in cost. It is amazing to realize that where the old unselected seed is used the average crop per acre is only half, compared to the more intelligent selection of strains. Our stock is selected for size of ear and fodder, which means a considerable increase in production. (56 lbs. per bushel.) Plant 8 to 10 quarts per acre in hills, sow 2½ to 3 bushels broadcast for fodder.

Never use Feeding Corn for Seeding Purposes.

Never use Feeding Corn for Seeding Purposes.

The best White Dent Corn. Ears 10 to 12

White Dent inches long, well filled at tip and butt; will mature in any corn country and in strong land and good season will make from 100 to 125 bushels per acre.

Peerless. (White). Produces generally two large ears to the stalk

the stalk.

Hickory King. The ears are rather small, but as they are borne 2 to 3 on a stalk it is a fairly good yielder.

Reid's Yellow Dent. Has from 18 to 24 rows; ear medium in size and of a bright yellow color.

King of the Earliest Dent. An early yellow corn, adapted for high latitude; will mature in 80 to 85 days.

Gold Mine. Early Yellow Dent, ripening only a few days later than King of the Earliest; ears are of good size. Leaming Yellow. Ears of good size, cob red and small, ripens quite early—frequently in 100 days from planting. Yields from 75 to 100 bushels per acre. Adapted to rich soils.

ripens yauthous ring. Yields from 75 to 100 bushess per acts. Including to rich soils.

Red Cob Ensilage. A Southern type of large, white corn, with deep red cob and strong leafy stalks.

Sugar Corn for Ensilage. There is nothing better for green feed or curing for winter than sweet corn.

SEED POP CORN

Plant Two Quarts to the Acre.

Sunflower (Mammoth Russian)

IMMENSE yielder—125 bushels of seed to the acre has been grown at less expense than corn. Very highly recommended for poultry. Best egg producing food known. Good feed for horses as well. May be grown to great advantage in waste ground, from early spring to the latter part of July. Plant 10 to 12 lbs., per acre.

Per lb., 15c; 10 lbs., \$1.00.



White Navy Beans

PLANTED in June or July, these usually make a very profitable crop to grow as shelled white beans for market. Plant in rows three feet apart, dropping two or three beans together a foot apart in the rows. Cultivate early, as they grow rapidly, but do not work them while the dew is on the foliage. (60 lbs., per bushel.) Special price on application.

Flax Seed

Northwestern. Sow at rate of $\frac{3}{4}$ to 1 bushel per Market price. (56 lbs. per bushel.)

Choice Seed Oats

Broadcast, 21/2 to 3 bushels to the acre.

We handle enormous quantities of the acre.

We handle enormous quantities of these and trace the demand to the excellent quality we handle; they are grown especially for us in cool regions, where they grow to perfection. (32 lbs. per bushel.)

Winter Turf. Perfectly hardy in the Southern and Middle States. Yields on good land, from 50 to 70 bushels to the acre of fine, heavy grain, weighing from 35 to 50 pounds to the measured bushel.

Heavy White. Market price.

Rosen Rye (Michigan Grown)

Grain unusually large and yield surpasses the old standard sorts. Our XXXX grade of Rosen Rye is grown for us in Michigan and is much superior to ordinary qualities offered under this name. Price on Application.

Seed Wheat Prices on Application

SEED POTATOES

Northern Grown Stocks

Selected and Grown Specially for Seed Purposes, Superior Both in Quality and Productiveness.

Selected and Grown Specially for Seed Purposes,
Superior Both in Quality and Productiveness.

Prices of Potatoes are unsettled at time our Catalogue
is printed. We will always fill orders from customers at
our lowest prevailing prices for first-class seed potatoes, or
we will cheerfully quote prices at any time upon request.
One peck will plant about 100 feet of row, or 100
hills. Ten bushels are required to plant an acre.
Early Ohio. (Red River Stock.) Is fully two weeks
ahead of the Early Rose, and is a general favorite.
Early Rose. It is productive, of most excellent table
qualities, and a most satisfactory early variety.
Early Six Weeks. Extra early, oblong in shape; flesh
solid; cooks dry and mealy.
Early Triumph. It is from seven to ten days earlier than
the Ohio. Skin is red, flesh is very white and firm.
Irish Cobbler. One of the first varieties of Potatoes to be
ready for market. The flesh is white and of fine flavor.
Burbank. A white-skinned medium early variety. The
flesh is white, very mealy and of fine flavor.
Carman No. 3. Prolific, averaging nearly a pound apiece;
flesh snow-white and of fine cooking qualities.
Chicago Market. Very popular, early, good quality and
yields well.

Hoosier Boy. A late variety and very productive.
Bull Moose. Late, large, very productive and of excellent
flavor.
Will be able to supply certified stock of Early Ohio

will be able to supply certified stock of Early Ohio and Early Triumph Seed Potatoes, only.

Seed Sweet Potatoes

Nancy Hall and Yellow Jersey. Write for prices. Ready for shipment about April 1. For plants, see page 25.

Prices subject to market changes. In ordering Farm Seeds always allow 32c for each 2-bushel Seamless Bag.

McCullough's High Grade Fertilizers

All Fertilizers Delivered Free on Board Cincinnati. Prices Subject to Change Without Notice.

THE benefits arising from the use of Commercial Fertilizers are too well known, and their value too well established, to require any argument or explanation-Soils that have been almost entirely exhausted by successive croppings have by their use, been restored to their former fertility; in fact, bring larger crops than when the soil is new.

ARMOUR'S LAWN AND GARDEN GROWER

THIS is a properly balanced concentrated plant food mixture blended from those chemical fertilizer ingredients best suited for the growing of grass and gardens. It is free from objectionable odors and weed seeds, is easily applied and gives quick results. Its plant food is largely soluble in water, yet will not readily leach from the soil in excessive rains. It contains more pounds of highest grade plant food than is generally used in lawn and garden fertilizer, having at least 16 times as much plant food as ordinary farm manure. It contains 6% Ammonia, 8% available Phosphoric Acid and 6% Potash, which analysis is of the proper ratio for such use. The continued systematic use of this fertilizer will materially aid in eradicating weeds from your lawn.

Use 4 to 6 lbs. per 100 square feet.

Use 4 to 6 lbs. per 100 square feet.

Send for descriptive circular.

5 lbs., 50c; 25 lbs., \$1.75; 50 lbs., \$2.75; 100 lbs., \$5.00

SHEEP MANURE—Pulverized

THIS is a natural manure; excellent for mixing with the soil. Strewn over and dug into the vegetable garden or placed directly in drills or hills, it promotes a rapid, steady growth. Especially valuable for lawns, contains all the constituents for promoting a quick, luxuriant growth and a rich green color. Use at the rate of from 500 to 600 pounds per acre. For pot plants, mix one part of sheep manure to six parts of soil. For use in the vegetable garden spread over the surface and dig in. Being soluble, it readily makes a safe liquid manure—one pound to five gallons of water can be used. 5 lbs., 30c; 10 lbs., 50c; 25 lbs., \$1.00; 50 lbs., \$1.50; 100 lbs., \$2.50.

CROWN PREPARED HUMUS

THIS article is prepared from deposits of decayed vegetable matter. It has been successfully used for years and has proven to be worthy of extensive use. It is desirable for greenhouse and flower garden work, also for lawns and vegetables.

For pot plants, mix about one-third humus with two-thirds regular potting soil.

For lawns and greenhouse benches, it is applied as a top dressing from one-half to one inch in depth, which should be then worked in.

If grass seed is to be sown, then is the time to apply it, and on golf links it is used in a similar way.

For flower and vegetable garden, apply at the rate of one-half to two inches deep and fork in well in the soil, or apply it in trenches the same as you would well rotted manure.

The prepared Humus is dry, thoroughly pulverized, odorless and clean to handle and apply and absolutely free from weed growth.

The following quantities are required to effectively cover an acre. If applied ½-inch in thickness, thirty tons per acre; if 1-inch thick, sixty tons per acre, and for general lawn work as a top dressing, one hundred pounds will effectively treat about 800 square feet, or three tons per acre.

5 lbs., 25c; 10 lbs., 40c; 25 lbs., 75c; 50 lbs., \$1.25; 100 lbs., \$1.75; 500 lbs., \$8.00; 1,000 lbs., \$15.00.

PURE BONE MEAL

THIS pulverized ground bone is excellent for rose culture and lawns. It decomposes rapidly and is quickly effective. Should be applied at the rate of 500 to 600 lbs. per acre. Analysis: Ammonia 2%; total phos. acid, 27%.

1 lb., 10c; 5 lbs., 40c; 10 lbs., 70c; 25 lbs., \$1.25; 50 lbs., \$2.00; per bag of 125 lbs., \$4.00.

A D C O

ARTIFICIAL STABLE MANURE Make It Yourself-In Your Own Garden

THE process consists of making a heap of all garden trash as it is collected, wetting it thoroughly, and adding to it a bacterial food—known as ADCO. In the course of three or four months the heap is converted by the action of the growing bacteria into a pile of excellent manure.

The recipe or formula is two pounds of ADCO with each wheelbarrow load of garden waste. Fifty pounds of ADCO make a ton of well-rotted manure.

To each ton of straw, hay, cornstalks or dried leaves, add 150 lbs. of ADCO to make four tons of fresh or three tons of rotted manure.

Each shipment is accompanied by simple directions which make any mistake impossible.

ADCO, in 25-lb. bags, each.....\$2.00 (Enough for 12 wheelbarrow loads of garden waste, making one-half ton of manure.)

ADCO, in special 150-lb. bags, each.....\$10.50 (Enough for a heap 10 ft. x 10 ft. x 6 ft., making about three tons of manure.)

AMMO-PHOS (AMMONIUM PHOSPHATE)

AMMO-PHOS contains 20% of ammonia, practically all soluble and readily available, and 20% of available phosphoric acid.

The product is dry and granular. It contains no free acid. It does not absorb moisture from the air. Its continued use tends to check the growth of white clover, goose grass, chick-weed and other noxious northern putting green weeds.

Send for descriptive circular.

1 lb., 15c; 2 lbs., 25c; 10 lbs., \$1.00; 25 lbs., \$2.00; 50 lbs., \$3.75; 100 lbs., \$7.00.

EVERGREEN LAWN LIME

THE GRASS AND GARDEN TONIC

THIS lime is especially prepared for use on soil, as it is essentially a plant food, useful for correcting acid soils, also for binding sandy soils and loosening clay soils. Should be applied at the rate of 1,000 to 2,000 lbs. per acre for sandy soils and 2,000 to 3,000 lbs. per acre for clay soils, a few weeks before applying Commercial

If the ground is covered with moss and the grass seems sour and unsightly, sprinkle Lawn Lime freely over the surface and watch the satisfying results.

Per bag of 80 lbs., \$1.00; 5 bags, \$4.50; 10 bags, \$8.00.

REGULAR BONE MIXTURE

(HALF AND HALF)

Is especially valuable for Field Crops. Potatoes and Grain. Should be applied at the rate of 400 to 500 lbs. per acre. Analysis: Ammonia, 2%; total phos. acid, 16%; potash

 K^{2O} , 2%, 5 lbs., 30c; 10 lbs., 50c; 25 lbs., \$1.10; 50 lbs., \$2.00; per bag of 125 lbs., \$3.25.

CATTLE MANURE—Shredded

A SUBSTITUTE for stable manure in gardens and greenhouses, as it supplies plant food, humus and organic matter; largely used for rose culture and for mulching. The quality we offer is selected manure taken from paved Stock Yards cattle pens—dried and sterilized by a high temperature direct heat process which kills weed seeds, fungus and disease germs. 100 lb. bags only. Per bag of 100 lbs., \$2.50.

COTTON SEED MEAL

RICH in Ammonia and Potash. An excellent fertilizer for Lawns and Golf Greens. Apply 15 lbs. to 1000 square feet. Per bag of 100 lbs., \$2.50.

(Fertilizers continued to next page.)

FERTILIZERS—Continued

AGRICULTURAL LIMESTONE DESTROYS SOIL ACIDITY—LOOSENS UP CLAY SOILS—TIGHTENS UP SANDY SOILS

PUTS soils in better mechanical condition and therefore aids in the development of beneficial soil Bacteria, which acts as a plant food for leguminous crops, such as Alfalfa, Sweet Clover, Red and Crimson Clovers, Soy Beans, Garden Beans and Peas, Cow Peas, Vetches, etc. Apply at the rate of 2,000 to 4,000 lbs. per acre, and may be applied at any season of the year.

Per bag of 80 lbs., \$1.00; 5 bags, \$4.25; 10 bags, \$7.75.

NITRATE OF SODA

As a top dressing use at the rate of 100 lbs., per acre between the rows when the plants are well established, on the following vegetables: Cabbage, Cauliflower, Egg Plant, Lettuce, Spinach, Beets, Celery and Onions. For Asparagus, a top dressing of 250 lbs. per acre when the young shoots are starting in the spring. For Strawberries, apply between the rows at the rate of 100 lbs. per acre at the time of blossoming. For the home garden, apply a solution of one ounce to two gallons of water.

1 lb., 15c; 2 lbs., 25c; 10 lbs., \$1.00; 25 lbs., \$2.00; 50 lbs., \$3.00; 100 lbs., \$5.50.

SULPHATE OF AMMONIA

OWING to the fact that it carries 5% more ammonia to the weight than Nitrate of Soda, the user should apply four pounds of Sulphate of Ammonia where he uses five pounds of Nitrate of Soda. 1 lb., 15c; 2 lbs., 25c; 10 lbs., \$1.00; 25 lbs., \$2.00; 50 lbs., \$3.00; 100 lbs., \$5.50.

PLANT STIMULANT TABLET

MAKES A WONDER GARDEN

USE it and you will have the largest crops of fruit and vegetables, and an abundance of the largest and sweetest-scented flowers of intense and vivid colors.

Here is the secret. Science has produced a tablet that is rich in plant food, containing 11 per cent Nitrogen, 12 per cent Phosphoric Acid and 15 per cent Potash, and it is odorless and clean. Compare this analysis with that of any other fertilizer.

Simply insert tablets in the sell near plants.

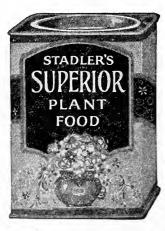
of any other fertilizer.

Simply insert tablets in the soil near plants. Or, four tablets dissolved in a gallon of water is the solution used instead of liquid manure and is less trouble and gives better results than the objectionable manure water. Make liquid applications to the soil—not on foliage or stems.

Complete directions with every package.

Price, postpaid; trial size (10 tablets) 15c; 30 tablets, 25c; 100 tablets, 75c; 1,000 tablets, \$3.50.

STADLER'S "SUPERIOR" PLANT FOOD



FOR Potted House Plants, Garden, Shrubs, Lawn and Trees, contains all the essential elements of plant life. For both indoor and outdoor plants, it is universal in its year-round use.

Put a tablespoonful of Superior Plant Food in the watering pot every time you sprinkle your garden, or a teaspoonful in the pitcher when you water your house plants—and then watch results! You will be amazed at the new glow of health and rich beauty your plants will show almost at once.

3 oz. can (making 12 ½ gallons) \$0.25 7 oz. can (making 27 ½ gallons) 50 16 oz. can (making 65 gallons) 1.00 an (making 65 gallons).......... \$1.00 can contains 600 treatments.

Prices Postpaid

IMPORTED GRANULATED

Prepared Bulb Fibre

Ferns, Palms and other potted foliage plants that are placed in jardinieres or window boxes, will keep wonderfully well, if the space between the pots is filled in with moistened Granulated Peat Moss to the height of the shoulder of the plant pots. Flower pots are porous and the capillary attraction of the roots draws the moisture from the moss through the pots; furthermore the air is allowed free access and is abreview computed damped another condition for

through the pots; furthermore the air is allowed free access and is always somewhat damp—a natural condition for most pot plants.

This Granulated Peat Moss or Mull is especially selected for horticultural purposes. It is finely granulated, of little weight, and is entirely free from foreign matter. It is packed in compressed bales, burlaped on all sides, sticked and wire strapped. When loosened the contents will cover 240 sq. ft. 1 inch deep. It is not sold by weight, because the weight of the bale is dependent on its moisture content, which varies according to atmospheric conditions.

A few of the many purposes for which it is used: Fertilizer Carrier, Mulching, Cold Frames, Lawns, Improving Soils, Propagating, Cuttings, Landscape Work, Benches (Greenhouse), Golf Courses, Packing, Storing Bulbs, Potting, Layering, Seed Beds, etc. Send for booklet giving detailed information.

information.

Prices: 60c per half-bushel; \$1.00 per bushel; large bale (13 cu. ft. and covers 240 sq. ft. one inch deep)...\$4.50

ACID PHOSPHATE 16%

SOME soils contain a large percentage of Nitrogen and some Potash, but still are deficient in Phosphoric Acid. This must be supplied for the purpose of producing a balanced combination of fertilizer elements, by the application of 16% Acid Phosphate which produces a beneficial effect by supplying the proper proportion of Phosphoric Acid. Apply from 200 to 400 lbs. per acre. Analysis: Available phos. acid 16%; insoluble, 1%.

5 lbs., 30c; 10 lbs., 50c; 25 lbs., \$1.00; 50 lbs., \$1.50; per bag of 125 lbs., \$2.50.

MURIATE OF POTASH

APPLY 100 to 150 lbs. per acre, usually with other fertilizers. This must be used with great care as it is very powerful. Excellent for Potatoes, Corn, Grain, etc. 1 lb., 15c; 2 lbs., 25c; 10 lbs., \$1.00; 25 lbs., \$2.00; 50 lbs., \$3.00; 100 lbs., \$5.00.

HYDRATED LIME

(Marble Cliff Lawn Lime)

 $\mathbf{T}^{ ext{HIS}}$ lime is used for sweetening acid or sour soils. For lawns, use 10 pounds of Marble Cliff Lawn Lime to the

100 square feet.
2 lb. carton, 15c; 10 lb. bag, 35c; bag of 50 lbs., \$1.10; 5 bags (250 lbs.), \$4.50; 10 bags (500 lbs.), \$8.00.

DRIED BLOOD MEAL

THIS is a splendid fertilizer for Roses, Carnations, Crysanthemums, etc., as well as for pot plants. Can be mixed with the soil or applied in liquid form. 1 lb., 15c; 25 lbs., \$2.00; 50 lbs., \$3.75; 100 lbs., \$7.00.

LAND PLASTER (Gypsum)

USED for top dressing newly plowed land prior to harrowing, also for mixing with Powdered Insecticides. Used on manure piles will prevent ammonia from vaporizing. 5 lbs., 25c; 10 lbs., 40c; 25 lbs., 90c; 100 lbs., \$2.00.

MOSS, PEAT AND POTTING SOIL

Moss, Green Sheet. For hanging baskets, etc. Per bale, 50c; large bundle (5 bales), \$2.00.

Moss, Sphagnum. For packing plants and growing orchids, etc. 1 lb., 15c; per bale, \$2.50.

Potting Soil. Peck, 35c; per bushel, \$1.25.

Write for Special Prices on lots of 500 lbs. or over

INSECTICIDES AND FUNGICIDES

Liquid Insecticides and Poisons cannot be sent by mail.

THE annual loss of Fruit and Vegetables from ravages of insects and fungous diseases is not due to poor material, but is primarily caused by lack of properly identifying the insect or fungous disease affecting the crop and applying the wrong material, or applying the material after it is too late to control the insect or disease.

In general, the following Insecticides and Fungicides are made for the purpose of controlling certain insects and fungous diseases and if the users will follow directions they should obtain good results.

*Ant Remedy (Liquid)

Useful against Ants in lawns, gardens, etc. 8-oz. can, 25c; 1 gallon can, \$2.00.



★Arsenate of Lead

(Dry Powdered)

FOR Potatoes use 2 to 3 pounds to 50 gallons of water FOR Potatoes use 2 to 3 pounds to 50 gallons of water, applying 50 gallons or more per acre. For all other purposes use 1 to 1½ pounds to 50 gallons of water, or one teaspoonful to 1 gallon of water, or one teaspoonful to 1 gallon of water, before putting into and Plants add about two pounds of lime to each 50 gallons spray liquid, ½-lb. pkg., 25c; 1 lb. pkg., 45c; 4 lb. pkg., \$1.50; 12 lb. pkg., \$4.25.

★"Black Leaf 40"

FOR Aphis indoors use 34 pint "BLACK LEAF 40" to 100 gallons of water or 1 teaspoonful to 1 gallon of water, with sufficient soap in water to make a good suds. For outside use apply solution double strength. Several formulas for destroying other sucking insects on each package. This is also a contact remedy. 1-oz. bottle, 35c; 3-lb. bottle, \$1.25; 2-lb. tin, \$3.50; 10-lb. tin, \$13.50.



★Bordo Lead **Powder**

Combined insecticide and Fungicide. Kills bugs and prevents Blight, Rot, Mildew and Fungus, in one spraying operation. Can be used for wetspraying or dry dusting. Can be used for Fruits, Vegetables or Flowers. 1 lb. makes about 7 gallons—ready to apply. ½ lb., 30c; 1 lb., 50c; 4 lbs., \$1.50; 12 lbs., 4.25

★Bordo Mixture (Dry Powder)

MANUFACTURED by a new process and will not dry out or deteriorate. Quantity to be used not over one-third the amount used in Bordo Paste Mixture. Mix with the required amount, enough water to make a

thin paste before putting into the spray tank.

Do not use on Peach, Japanese Plum or other tender foliaged plants, unless diluted to one-half strength. ½-lb. pkg., 25c; 1-lb. pkg., 40c; 4-lb. pkg., \$1.25; 12-lb. pkg., \$3.00.

Bug Death

ESPECIALLY valuable for Cucumbers, Egg Plants, Melons, Rose Bushes, Currants and Potatoes. It drives ants from lawns, and will not injure the grass. Apply with powder bellows and dust Bug Death evenly over the plant. The best time for applying is early in the morning while the plant is wet with dew, as the powder will adhere more readily.

Bug Death will not injure any Plant, Tree, or Vine. 1 lb., 20c; 3 lbs., 40c; 5 lbs., 50c; 12½ lbs., \$1.40.

By Parcel Post—1 lb., 30c; 3 lbs., 50c; 5 lbs., 75c; 12½ lbs., \$1.75.

*Calcium Arsenate (Dry Powdered)

IN all garden operations this remedy offers protection against the Bean Beetle, Potato Beetle, Cabbage and Tobacco Worms and other leaf-eating insects. Can also be used effectively in combination with Sulfocide. Use 1 part of Calcium Arsenate to 9 parts of Hydrated lime for Bean Beetle. 1 lb., 35c; 4 lbs., \$1.25; 12 lbs., \$2.75.

★Cut Worm Killer

FOR use as Poisonous Bait Against Cut Worms and Slugs by placing around plants subject to attack. It has an enticing odor that worms prefer to vegetation.

NOTE: One pound is sufficient for 100 plants in hills 75 in rows.

(FOR GREENHOUSE FUMIGATION)

ALL fumigation should be started by using one-quarter ounce of Calcium Cyanide for each 1,000 cubic feet of space, the correct dosage for a tight house. This dosage should kill 100 per cent of aphis ("black fly," "green fly," etc.) such as rose aphis and chrysanthemum aphis; 100 per cent of the adult and larvae of the white fly; all exposed thrips, and the younger stages of the soft scale.

If it is inconvenient to weigh out the Calcium Cyanide it may be measured with sufficient accuracy on the basis

If it is inconvenient to weigh out the Calcium Cyanide it may be measured with sufficient accuracy on the basis of one-half ounce for the average level tablespoonful.

Fumigating Greenhouses with Calcium Cyanide, will effect a saving to most growers of more than 75 per cent over the cost of present methods of fumigation.

Cyanogas Calcium Cyanide is also effective for the control of Ants, Moles and Rats, Write for booklet.

Per lb., 75c; 5 lbs., \$3.00; 25 lbs., \$10.00.

Derrisol

DERRISOL is an ideal, non-poison-ous, contact inspections ous contact insecticide for controlling sucking insects where recommended, and also to control some leaf-eating larvae at the same time.

It is highly concentrated and convenient and easy to use.

One part of Derrisol mixes with 800 parts of water. 1 oz. bottle, 35c; 3/2 lb., \$1.20; 1 lb., \$2.00; 2 lbs., \$3.00; 10 lbs., \$12.00.

By Parcel Post—1 oz. bottle, 50c; ½ lb., \$1.35; 1 lb., \$2.20; 2 lbs., \$3.25; 10 lbs., \$12.50.



ungtroger

THIS highly concentrated fungicide conquers Mildew on roses and other plants practically over night and controls Black-Spot. A new and improved form of the famous Rosenbluth formulae, combined with a nitrogenous element that fertilizes through the foliage. It also stimulates hollyhocks and geraniums; prevents rot and eliminates rust on carnations and the diseases of Delphin-

By P. P. \$0.90 Half Pint.....\$0.75 Pint 1.25 Quart 2.00

Fish Oil Soap

FOR destroying scale insects on Plants, Trees, Vines, etc., for washing down the bark of Trees, Grape Vines, etc. Dissolve one pound in one gallon of hot water, then add 9 to 10 gallons of cold water; for trunks and branches of trees use a thicker solution and apply with a brush. This is also a contact remedy. 1 lb., 35c; 5 lbs., \$1.50; 25 lbs. in bulk, \$5.00.

By Parcel Post—1 lb., 45c; 5 lbs., \$1.75.

★Zenke's Liquid Fungicide

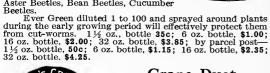
A POWERFUL reliable remedy for Leaf Spot, Leaf Rust, Seab, Mildew, Black and Brown Rot and most other Fungoid troubles. Per gallon, \$3.00. (Sufficient to make 50 gallons of solution.)

Contact Remedies to be Effective Must Reach the Insects. NOTICE—Insecticides prefixed by star (*) cannot be mailed.

INSECTICIDES AND FUNGICIDES—Continued



Ever Green Non-Poisonous In-Eyer Green Non-Poisonous Insecticide is recommended especially for killing the following Insects: Ants, Cut-worms, Cabbage Worms, Green Flies, White Flies, Thrips, Leaf Hoppers, Currant Worms, Aphis (Plant Lice), Rose Chafer, Rose Slugs, Pear Slugs, Mealy Bugs, Mites, Red Spiders, Japanese Beetles, Leaf Tiers, Potato Beetles, Squash Beetles, Cucumber Beetles, Bean Beetles, Cucumber Beetles, Bean Beetles, Cucumber Beetles,



OS GRAPE



Grape Dust

NON-POISONOUS powder, A usually effectual for the remedy and control of most powdery mildews on Grapes, Goosedery influews on Grapes, cooseberries, Roses, etc. Apply with powder bellows and dust evenly over plants. 1 lb., 25c; 5 lbs., \$1.00; 10 lbs., \$1.90.

**By Parcel Post—1 lb., 35c; 5 lbs., \$1.15; 10 lbs., \$2.25.

★Lime-Sulphur Solution

FOR fall, winter and early spring spray. Destroys San Jose Scale, Peach Leaf Curl, Bud Moth, Apple Aphis, Blister Mite, any Scale Insects or Bark Lice. 1 gallon will make 8 gallons spraying liquid. 1 qt., 50c; ½ gal., 75c; 1 gal., \$1.00; 5 gals., \$4.00; ½ bbl. (30 gals.), \$10.00; 1 bbl. (50 gals.), \$15.00.

Dry Lime-Sulphur
From 10 to 12 pounds of Dry Powdered Lime-Sulphur should be used with 50 gallons of water, for a dormant

From 2 to 3 pounds to 50 gallons of water in combination with 1½ pounds of Dry Powdered Arsenate of Lead should be used for summer spraying on all seed fruits such as Apples, Pears and Quinces, and half this strength on all stone fruits. 1 lb., can 35c; 5 lb. can, \$1.50; 10 lb. can, \$2.75; 25 lb. can, \$5.00. By Parcel Post—1 lb., 45c; 5 lbs., \$1.65; 10 lbs., \$3.10.

★Magnesium Arsenate Dust For Control of the Mexican Bean Beetle.

From the start of the Mexican Bean Beetle in 1920 the National as well as the State Etymologists have worked with different sprays for control with various results. For the last five seasons Magnesium Arsenate Dust has given the best results because it does not burn foliage.

DIRECTIONS FOR APPLYING

Direct the dust to the under sides of the leaves, with a Powder Duster, since the bean beetle feeds there. Cover the plant thoroughly, using 12 to 15 pounds per acre, depending on size of plants and degree of infestation. 1 lb., 40c; 4 lbs., \$1.50; 12 lbs., \$4.00.

PARADOW (Para-Dichlor-Benzene) Kills the Peach Tree Borer

Full directions on each package. Must not be used on young trees. Ask for descriptive circular. Prices: 1 b., **60**; 5 lbs., **\$2.50**; 10 lbs., **\$4.25**. By Parcel Post—1 lb., **70**c; 5 lbs., **\$2.75**; 10 lbs., **\$4.60**.

★Pyrox

Pyrox is a dependable all-around spray Pyrox is a dependable all-around spray for use on vegetables and fruits. It combines a strong poison for controlling leaf-eating insects and a powerful fungicide for the control of plant diseases such as potato blight, rots, and rusts. It has filled the need for a reliable material for general purpose spraying for twenty-five years—it has stood the test of time and practical field experience.

Pyrox is packed in convenient sizes and is all ready for use by mixing with cold water. 1 lb. jar, 50c; 5 lb. drum, \$2.00; 10 lb. drum, \$3.50.

★Nico-Fume Liquid

FOR destroying Aphis, Thrip and Red Spider. Contains 40 per cent nicotine.

Use one to two teaspoon-fuls of Liquid to each gallon

of water.
This is a contact remedy.
4 lb., 75c; 1 lb., \$2.25; 4 lbs.,
\$8.00; 8 lbs., \$15.00.

★Nico-Fume Tobacco Powder

For fumigating greenhouses.

FOR Florists and growers who prefer a high-strength, especially prepared, tobac

especially prepared, tobacco powder fumigant, to destroy Aphis, Thrips, etc., we hereby offer "Nico-Fume" Powder—which may confidently be relied upon as being worthy to bear the name of "Nico-Fume." 1-lb. tin, \$1.25; 5-lb. tin, \$4.75; 10-lb. tin, \$8.50.

*Paris Green

A POISONOUS Insecticide in powder form for insects that chew. Largely used on Potatoes and Tobacco. Can be used as a spray, or dry and applied with Dry Dusters.

When used as a spray dilute one pound Paris Green in 150 to 300 gallons of water. When used on Fruit Trees add two pounds lime. ½-lb., 20c; ½-lb., 30c; 1 lb., 50c.



Slug Shot

NICO-FUME"

Liquid

"FREE" NICOTINE

is, \$15.00 i Pound, \$2.25 % Found, 75

Both warm water feety, that weight stone in the country would have a feet and the state of the s

LOUISVILLE, NY., U. S. A.

co by-Products and Chemical Corporati

Price, \$8.00

VERY effectual in destroy-ing Caterpillars, Currant, Gooseberry and Cabbage Worms, Mexican Bean Beetle, Potato, Melon, Squash and Cucumber Bugs, Rose Slugs,

SULFOCIDE

when used on Melon, Squash and Cucumber Vines should be put on lightly. 1 lb. carton, 25c; 5 lbs., 75c; 10 lbs., \$1.35.

★Sulfocide

THIS is a powerful Fungicide for many fungous eases of Apples, Pears, Quinces, Peaches, Pl. Cherries, Grapes and small fruits. Is also very effective for Blight on Potatoes, Beans, Melons and other vegetables; in fact, anywhere a strong fungicidal spray is needed. Plums.

fungicidal spray is needed.

SULFOCIDE does not deteriorate with age, contains no lime or oil and is ${\tt non-poisonous}.$

A few minutes after being sprayed it decomposes, leaving a coating of sulphur so fine as to be almost invisible except where drops accumulate.

Dilute at the rate of 1 gallon in 200 gallons of water; this is equivalent to 1 quart in 50 gallons of water, 1 cupful (8 oz.) in 12 gallons of water, 2 oz. in 3 gallons of water, 1 tablespoonful in 3 quarts of water.

For Peaches, Plums, Apricots and Stone Fruits

When the buds are ready to open and just show color use "Sulfocide", 1 quart to 50 gallons of water. 1 pt., 70c; 1 qt., \$1.00; 1 gallon, \$2.75.

*Scalecide

Controls Scale. If your trees are infested with scale give them a Scalecide spray in the fall. Scalecide does a thorough job by creeping under the protective scales and into cracks and crevices of the rough bark.

Scalecide also controls Pear Psylla, Leaf-Curl, Fire Blight, Case Bearer, Bud Moth and Makes Trees Vigorous and Productive, because it Spreads into Cracks and Crevices.

The Oldest Commercial Dormant Spray. Scalecide has been in use since 1904. It antedates commercial lime-sulfur and all other commercial dormant sprays. Almost a quarter century of successful use is convincing evidence that Scalecide offers real value to the fruit grower.

1 qt., 75c; 1 gallon. \$1.75; 5 gallons, \$6.25; 10 gallons, \$10.60; 15 gallons, \$14.00.

NOTICE-Insecticides prefixed by star (*) cannot be mailed.

INSECTICIDES AND

Sulphur, Powdered
USED principally to prevent and cure mildew on Roses and Plants in greenhouses. 1 lb., 15c; 2 lbs., 25c; 5 lbs., 60c; 10 lbs., \$1.00. By Parcel Post—1 lb., 25c; 2 lbs., 35c; 5 lbs., 75c; 10 lbs., \$1.25.

SUNOCO SPRAY OIL
Self Emulsifying. Dormant Spray for fruit and shade trees and shrubs. 1 gal., \$1.25; 15 gal. drum, \$10.50.

Destroys Flies, Mosquitoes, Moths, Ants, Bed Bugs, Roaches—Other Insects and Their Eggs.

Fit clears the house in a few minutes of mosquitoes and disease-bearing flies. Flit spray penetrates cracks and crevices where bed bugs and roaches breed, destroying the insects, their eggs and larvae.

and larvae.

Flit, sprayed on garments destroys moths, their eggs and the tiny worms called larvae that eat holes.

Spray Flit freely about the room, keeping doors and windows closed. After five or ten minutes flies will be found dead on the floor. All odor will disappear if room is freely aired.

½ pt., 50c; 1 pt., 75c; 1 qt., \$1.25; 1 gallon, \$4.00





★Weed Killer, Key Brand

A HIGHLY concentrated solution which dilutes one part to 50 parts of water. It is effective within 12 hours after application and one application will keep paths and roadways free from weeds for an entire season.

1 qt., 65c; 1 gal., \$1.75; 5 gals., \$7.50.

Volck

A MONG the many pests growers have to contend with are red spiders, mites, aphis (green fly), thrips, mealy bugs, scales, white flies, caterpillars, leaf rollers. Most every grower has experienced difficulty in the control of one or more of these pests. All of them are safely and effectively controlled with Volck. Rose mildew can be prevented and stopped by Volck. ½ pt. can, 50c; 1 pt. can, 75c; 1 qt., \$1.00; 1 gal., \$3.00; 5 gal., \$12.00.



By Parcel Post—1/2 pt., 60c; 1 pt., 90c; 1 qt., \$1.15; 1 gal., \$3.35. Full directions on each can.

★Thrip Juice

*Inrip Juice
(Hammond's)

EFFECTIVE against Thrips and
Black Fly, Aphis, Red Spider,
White Fly, Soft Scale, Mealy
Bugs and certain other insects of
this class on Roses, Chrysanthemums, Carnations, Grapes, Cherry
and Apple Trees. This is a contact Insecticide
Diluted for use, 1 part of Thrip
Juice with 40 parts of water.

1 pt., 75c; 1 qt., \$1.25; 1 gallon, \$3.75.



Tobacco Dust

A SURE remedy for Green Fly, Aphis, Fleas, Beetles, etc. 1 lb., 10c; 3 lbs., 25c; 10 lbs., 55c; 100 lbs., \$4.50.

TOBACCO DUST FOR FUMIGATING. 1 lb., 15c; 4 lbs., 40c; 10 lbs., \$1.00; 25 lbs., \$2.00; 100 lbs., \$6.00.

Tobacco Stems

USED for fumigating plants to kill insects, and as a mulch for Roses, Asters, Lettuce, etc. 1 lb., 5c; bale of about 125 lbs., \$2.00.

Tree Tanglefoot

FOR protecting trees against climbing insect pests in a simple, economical and effective way; put a band of Tree Tanglefoot, from 3 to 5 inches wide completely around the tree. A perfect safe-guard against Gypsy, Brown-tail and Tussock Moth, Canker Worms and Ants, and other creeping insects. 1 lb., 60c; 5 lbs., \$2.75; 10 lbs., \$5.25; 25 lbs., \$11.00. By Parcel Post—1 lb., 70c; 5 lbs., \$3.00; 10 lbs., \$5.65.

★Uspulun

FUNGICIDES—Continued

The Original Organic Mercury Disinfectant



Showing extreme case of damping-off in cabbage. To right, soil untreated—almost all plants killed. To left, soil treated -stand very satisfactory.

Use as a soil drench for damping-off of vegetable, flower and conifer seedlings. Use as a soak treatment for Barley Smut and Stripe. Use as a soak treatment for seed corn diseases where the soaking method is desired. 2 oz., 50c; 1 lb., \$2.75; 5 lbs., \$13.00.

★ DIPDUST

Organic Mercury Disinfectant

SPECIALLY for control of vegetable and flower seed diseases. Use as a dip for potatoes, bulbs, corms and roots. Use as a dust for all vegetable and flower seeds, and especially for control of sweet and field seed corn diseases. The most convenient, inexpensive and effective method of seed corn disinfection. Apply as a "Dust." 4 oz., 50c; 1 lb., \$1.75; 5 lbs., \$8.00.

★Uspulun Nu-Green

Especially for

GOLF COURSE GREENS TENNIS COURTS, PARKS, LAWNS

UNSIGHTLY appearance of golf greens and poor putting surface can be avoided. Greens may now be kept healthy and in perfect condition throughout the entire season. Brown-Patch, the bane of greenskeepers and the stumblingblock to many a par score, need no longer be accepted as a necessary evil—for a new method of treatment has been perfected which will prevent the appearance of this

nas been perfected which will prevent the appearance of this dread disease even in the most humid weather.

Nu-Green is a positive preventive for Brown-Patch. If Brown-Patch has already appeared, Nu-Green will destroy the disease and check further progress.

Nu-Green is quick and sure in its action. Improvement is immediately noticeable—and complete cure is effected in from 3 to 5 days. 1 lb. tin, \$2.00; 5 lb. tin, \$9.00.

Free descriptive booklet on request.



Atlas Non-Poisonous Weed Killer

EXTERMINATES all undesirable vegetation—including poison ivy, etc.—as easily as watering a garden, without poison hazard to humans or animals.

For the Simply mix with water and apply on any vegetation—Weeds, Grass, etc., with a sprinkling can or sprayer.

Especially, recommended for obtaining weed-free driveways, paths, tennis courts and gutters.

DRY SUPER CONCENTRATE (Mailable)

Small cans (make 2½ gals. of weed killer), 50c. Large cans (make 20 gals. of weed killer), \$2.00. By Parcel Post—Small Can 60c; Large Can \$2.25.

★Vermine

THIS is a soil sterilizer and vermicide which will destroy many of the insects and other vermin working in the soil at the roots of plants.

For potted plants, which are frequently infested with Angle and Eel Worms when confined in the house, a thorough drenching of the soil with Vermine will destroy the worms. ½ pt., 40c; 1 pt., 65c; 1 qt., \$1.00; 1 gallon, \$3.00.

NOTICE-Insecticides prefixed by star (*) cannot be mailed.

SPRAYING PUMPS AND APPLIANCES

SPRAYING is of such importance that the Experiment Stations all over this country have given much of their attention to it, and their findings have been of incalculable value. Diseases and insects can no longer exist if the proper Insecticide is applied through the medium of an up-to-date spray apparatus.



Paragon Sprayers

THESE Sprayers are strongly constructed and can be easily operated by one man. They can be brought in close proximity to the work, thereby eliminating the use of a long, expensive hose. Our patented, self-cleaning strainer prevents the necessity of first straining the liquid to be sprayed. The agitator also keeps the liquid thoroughly stirred. The spray nozzle has only $\frac{1}{2}$ inch outlet and spreads the liquid well, thereby covering a large surface with a small amount of liquid, making it a very economical sprayer. All parts of the machine are made of the best material obtainable.

obtainable.

The reservoir is made of heavy galvanized iron. All essential fittings and valves are made of brass, making it strong and durable. The body of pump is cast iron, well ribbed to prevent breakage. The screen is of heavy perforated brass and will last many years. The pump frame can easily be removed from tank when it needs cleaning and by running water through machine after using, the entire machinery can be easily and thoroughly cleaned. thoroughly cleaned.

Suitable for spraying Insecticides and Fungicides on trees, shrubs and vines, as well as the application of Whitewash and Cold Water Paints.

Paragon Sprayers Do Not Clog.



Price List of Paragon Sprayers

No. 0. Capacity, 3½ gallons. Equipment, 4 feet spray hose, 3 feet spray pipe, 1 mist spray nozzle, 1 steel cap for mist nozzle, 1 straight spray. Price....\$12.50 No. 1. Capacity, 6 gallons. Equipment, 5 feet 6-ply hose, 5 feet spray pipe, two spray nozzles. Price.....\$17.50

 sired. Price
 \$25.00

 3. Machine without truck. Price
 \$21.50

\$25.00

No. 4. Capacity, 28 gallons. Equipment, 20 feet 6-ply hose, 10 feet spray pipe, two spray nozzles. Mounted on two strong 30-inch wheels. Price. \$39.50 No. 4. Machine without wheels. Price. \$29.50 No. 5. Capacity, 50 gallons. Equipment, 25 feet 6-ply hose, 10 feet spray pipe, one 3-way spray nozzle, one single spray nozzle. This sprayer has solid cast brass pump and large air chamber. It is positively the very best hand power sprayer made for tree spraying. Price. \$45.00 Nos. 1 and 3 Sprayers can be furnished with solid all cast brass pump for—additional. \$5.00 No. 4 Sprayer can be furnished with solid all cast brass pump for—additional. \$6.00 Send for descriptive circular giving detailed information.

tion.



Bamboo Brass Lined Spray Poles

Net price.......\$5.00 Net price.......4.50 12-foot lengths.



Hudson Perfection Compressed Air Sprayer

T is just the thing for general work around the house, in gardens and small farms. Used for potato spraying, white-washing, spraying disinfectants, cold water paints,

Tank. 7½ inches diameter, inches long, capacity, 4 20 gallons.

Made of first quality gal-vanized sheets or all brass as ordered

No. 110G. Galvanized Steel Tank, Capacity, 4 gal.,\$6.50 No. 110B. Brass Tank. Ca-pacity, 4 gallons....\$9.50

Hudson Perfection Junior Compressed Air Sprayer

TANK, 6½ inches diameter, 17 inches long, capacity about 2½ gallons. Made of first quality galvanized sheets. Tested under actual working conditions at the factory.

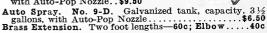
Galvanized Tank. No. 140-G No. 140—B. Brass Tank. Price, each.......\$7.00



Auto Compressed Air Sprayer

CAN be suspended from the shoulder, allowing the free use of the arms. A few strokes of plunger in air chamber will compress enough air to discharge the entire contents. A practical machine for potatoes, tobacco, small fruits, vineyards, poultry houses, green houses, etc. Extension pipes for spraying trees.

Auto Spray. No. 9-B. Brass tank, capacity, 3½ gallons, with Auto-Pop Nozzle..\$9.50



JIM DANDY SPRAYER

EVERY owner of a garden should keep on hand the proper size of Spray Pump as well as a supply of spraying material for immediate use when needed.

We carry a large line of various equipments and remedies all described in this catalog.

We are prepared to quote special prices on Insecticides in large quantities.

SPRAY PUMPS AND HAND SPRAYERS—Continued

It Sprays Continuously -----REMOVABLE SYCHON TUBE MOZZES IN ONE PACTS AS WRENCH FULLY PATENTED AND PATENTS PENDING

AUTO-SPRAY No. 26

THE Auto-Spray No. 26 is so designed that the pressure generated on the down stroke of the plunger allows this sprayer to produce a continuous mist-like spray. This is a decided advantage over ordinary atomizers, which are intermittent, in that spraying can be done more rapidly and with less exertion. This sprayer has a number of advantages which other Atomizers lack.

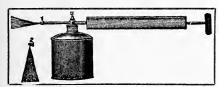
USES—For spraying garden crops, for use in green-houses, for handling disinfectants, and fly oils. It can be used with all spraying solutions.

Auto Spray No. 26B, 1 quart tin pump, brass tank

MYER'S SPRAY PUMPS

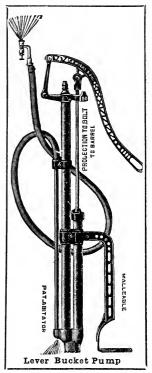
Four-foot Pipe Extension, 60c. Bordeaux Nozzle, \$1.00. Graduating Vermorel

ROBERTSON COMPRESSED AIR SPRAYER



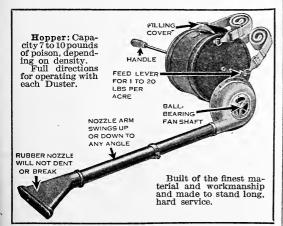
THEY give a continuous spray. By means of the universal nozzle the spray can be thrown on the under side of the leaves of plants and shrubs, the underside of beds and other furniture, into corners, behind doors, on top of mouldings, window casings, behind steam pipes, and other difficult places. Capacity, one quart.

Tin Pump with Tin Reservoir, each 90c; Tin Pump with Galvanized Reservoir, each, \$1.15; Brass Pump with Brass Reservoir, each.......\$1.65



ATOMIZERS, BELLOWS AND POWDER DUSTERS

Savage Dry Powder Duster



THE Savage is free running and easy cranking, has no brushes or wipers. Bronzeand steel gears packed in grease, sealed in gear case, never require any attention. Fan shaft runs on ball bearings. Large opening for easily filling with poison.

The nozzle tube may be raised up or down for spraying short or tall plants or trees. Does not discharge poison in "chunks" or "gobs" but thoroughly breaks it up and dusts evenly. Feed lever adjusted from 1 to 20 pounds per acre, which is a wonderful improvement over any duster made.

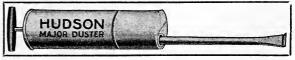
These Dusters are used extensively for tobacco, vegetables, grapes, melons, celery, citrous fruits, golf courses, etc. All kinds of powdered insecticides may be used with the greatest economy. Price..........\$20.00 MIDGET ATOMIZER. OGET ATOMIZER. A small compact, substantial and very efficient Tin Sprayer. Price, each......35c

Hudson Scout Duster



THE Hudson Scout Duster is adapted for use with all insect powder. Because of its size and efficiency it is a fayorite with the housewife in applying roach, ant, and Price various bug powders.

Hudson Major Duster



THE Hudson Major Duster is designed for the home gardener, the small truck farmer or fruit grower, for use in and around the home, dairy, etc. It will handle all dry powdered insecticides very satisfactorily. Price.....\$1.00

BELLOWS, DUSTERS AND SUNDRIES—Continued

FEENY MODEL DUSTERS

Approved Dusters for Mexican Bean Beetle Control

THESE Dusters are efficient, durable and easy to operate and reload. They are equipped with extension tubes and special nozzles for dusting upward from underneath plants and vines. They are the approved type for Mexican Bean Beetle control and are recognized as standard dusting outfits for applying all kinds of powdered insecticides in fields, because of the control and are recognized as standard dusting outfits for applying all kinds of powdered insecticides in fields, the control and are recognized as standard dusting outfits for applying all kinds of powdered insecticides in fields, the control and the control a vinevards, gardens, etc.





ACME POWDER BELLOWS. It requires no base of supplies; all you need carry is a can of dry Insecticide and bellows. Without stooping—the elbow does it —it applies any powdered poison on any plant in any desired quantity. The elbow may be detached, if desired. We also furnish a spreader for distributing the blast. Price, each.....\$1.75

The Model C Duster. Is used for dusting Insect Powder effectively. Price.......75c WOODASON'S POWDER BELLOWS.

Single cone, small, \$2.75; single cone, large \$4.00

The Harris Ever-Ready Frost Protectors

Size 12 inches high, 10 inches across base. One Anchor Stake with each Protector. Per dozen, 75c; per 100, \$5.00.



-Place Hotkap in "Setter."

HOTKAPS

You Make More Profit Using This Amazing New Method of Plant Protection

AST year thousands of growers added to the value of their crops by using HOTKAPS. This remarkable invention consists of a scientifically constructed wax paper cone that you place over each plant. Thus they are miniature hothouses that protect plants from frost. wind, rain, insects and ground crusting.

HOTKAPS not only protect plants, but make them grow hardier and er. Thus you get a greater crop production to market earlier for higher faster. prices.

You can add to your next year's profit with Hotkaps. They cost but a fraction over a penny each. One man can "set" 3000 Hotkaps per day. They not only bring you higher prices, but are a method of crop insurance—against the danger of the elements.

PRICES ON HOTKAPS



-Press Setter ¼-inch in ground.







1,000 lots—per 1,000..... 5,000 lots—per 1,000...... 11.00 Larger quantities—per 1,000...... 10.50 Hotkap Setters—each...... 2.50

Postage or Express extra. Send for descriptive circular.

Paper Plant Bands and Pots

Packed 250 to a box

Saves time and labor to anyone growing

their own plants from	secu.	Per	Per
	Depth	100	1000
Plant Bands 2x2	$2\frac{1}{2}$	40c	\$3.50
Pots with folding bottom3x3	3	70c	6.00

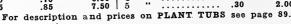


Neponset Waterproof Paper Flower Pots

Lower In Cost Than Earthen Pots and Unbreakable.

For over twenty years florists, nurserymen and market gardeners have used the NEPONSET Flower Pot with entire satisfaction. The pot eliminates the troubles and loss caused to shippers of plants and nursery stock in clay pots. For transplanting and shipping potted plants, and for rooting or shipping Strawberry, Tomato and Cabbage plants, NEPONSET Waterproof Pots are almost ideal.







HORTICULTURAL TOOLS AND SUNDRIES

BASKETS, WIRE HANGING. 8-inch, 20c; 10-inch, 25c; 12-inch, 35c; 14-inch, 40c; 16-inch, 50c; 18-inch, 65c; 20-inch, 80c.

LOWS, ACME. Well made, with a solid hard wood head block, hard wood handles, best leather for the bellows, and extra elbow is furnished to tilt the funnel for getting under the leaves of plants and shrubs. BELLOWS, ACME. Each.....\$1.75

BELLOWS, WOODASON'S. Single cone, small....\$2.75 Single cone, large . . . 4.00 BLUE GRASS STRIPPER. Each..... 2.00

GULTIVATOR, NORCROSS. Hand
Garden. The Prongs are square
spring steel bent corner-wise with
forged shovels at the ends. The
Socket Frame and Clamping Bar
are made of toughest malleable.
Handle, best grade of White Ash.
5 Prong, 4 ft., each..............\$1.25



CANES. Six to nine feet long, for plant stakes. Per 100
CANES. Four to six feet long, per 100\$1.75
CANES. Japanese, green dyed, 3 feet long, per 100\$1.50
DANDELION DIGGER. Made from steel
DANDELION KNIFE, with long handle\$1.00
plants. Price
EDGING KNIFE. For cutting edges of walks and beds. Price
FORKS, DIGGING OR SPADING \$1.75 to \$2.00
FORKS, HAND-WEEDING. Small size. 25c: large size. 50c
FRUIT PICKER. Made of galvanized steel wire; attaches to pole of any length. Price, without pole
GARDEN LINE. Per ball of about 150 feet\$1.00
GARDEN LINE REEL. Iron\$1.50
GLASS CLOTH. A substitute for glass; per yard, 40c; 10 yards, \$3.50; 100 yards, \$32.00.
GLASS CUTTER, GOLD TIP. The best cheap cutter on the market. For all around usefulness we prefer it to a diamond. Each, 20c; per dozen\$2.00
GLAZING POINTS, PEERLESS. Will stop your glass from sliding. Made of galvanized steel wire. No rights or lefts. Can be used on either side.
No. 1. For small single-thick glass. Per 1,00075c
No. 2. For large single-thick glass. Per 1,00075c No. 2 ½. For double-thick glass. Per 1,00075c
GLAZING POINTS, ZINC CITY. Are positively the best; last forever; a sure preventive of glass slipping. Effective on large or small glass; easy to drive, easy to extract. Per lb
GRASS HOOKS. American50c



GRASS HOOKS. English, riveted
 GRASS
 HOURS.
 English.
 100 mg.
 85c

 GRASS
 HOOKS.
 English.
 riveted back; No. 3.
 \$1.00
 GRASS HOOKS. With long handle.....\$1.50 GRASS SHEARS. American. 50c, 75c, and \$1.00 GRASS SHEARS. Imported..\$1.75
GRASS SHEARS. With long
handle.......\$2.50

Wiss Grass Shears

Wonderful Cutters-Hold Their Edge

Fine tempered cut-lery steel blades, comfortable handles, cut easily. Don't tire the hand stay in ad justment. Price..\$1.50



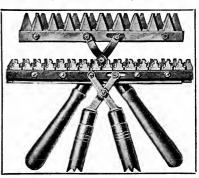
GUNS, INSECT POWDER. JUMBO......35c

HEDGE SHEARS. American, 6-in., \$1.75; 8-in., \$2.25; 9-in., \$2.50.

HEDGE SHEARS. English, 8-in., \$3.25: 9-in., \$3.50

HEDGE TRIMMER THE SIMPLICITY

It has 19 big, safe, keen teeth, cutting cleanly both when opening and closing. Is the only trimmer suc-cessfully demonstrated and proved to be wonderful a d vancement over the old-style hedge shear. Price....\$4.00



SIMPLICITY HEDGE PRUNER AND TRIMMER

With this tool you can actually do as much work in one hour as you formerly did in four hours with the oldstyle pruner or lopping shears. It has 31 big, safe, keen fluted teeth, cutting cleanly both when opening and closing. HOES. ONION. One end square: opposite end one HOES. ONION. One end square; opposite end two HOES, GRUBBING. With handle\$1.00 HOES, SANDUSKY......\$1.00 HOES, ENGLISH SCUFFLE OR PUSH. Without HOES, AMERICAN SCUFFLE. 8-inch with handle. . \$1.25 HOSE, RUBBER. (See Lawn Requisites.) KNIVES, PRUNING......\$1.25 to \$2.00 KNIVES, BUDDING...... 50c to \$3.00 KNIVES, ASPARAGUS. American......40c LABELS, WOOD. For pots, painted: Per 100 Per 1,000 4 x 5 inch 5 x 5 inch 6 x 5 inch 8 x 7 inch 10 x 7 inch 12 x 1 4 inch \$2.50 \$0.30 .35 3.50 90 8.00 9.00 1.00 LABELS. Tree, copper; No. 1, per 100......\$1.50

LAMP, DEFIANCE FUMIGATING. (For use in greenhouses.) It burns kerosene. It is made of heavy tin throughout. Each, 65c; per dozen..........\$6.50

LAWN ROLLERS, LAWN MOWERS, ETC. See pages 88, 89 and 92

MASTICA. For glazing greenhouses. The use of Mastica avoids the necessity of repeatedly reglazing the house, saving much time and expense. One gallon will cover about 300 running feet (one side). One gallon..\$2.75 MASTICA GLAZING MACHINE\$2.75

MATCH PLANT STICKS, painted green 12-inch, per 100, 30c; per 1,000, \$2.50. 18-inch, per 100, 40c; per 1,000, \$3.00.

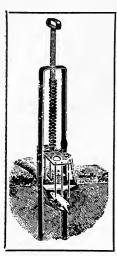
Milo Hot Bed Mats

Made from heavy weight burlap, absorb-ent pulp and felt ce-mented together with a specially prepared water-proof compound.

This combination forms a covering both airtight and waterproof. Also make ideal truck covers for marketing vegetables. Size 78x80 inches. Price...\$5.00



HORTICULTURAL TOOLS AND SUNDRIES-Continued



MATTOCK, LONG CUTTER. With handle.....\$2.00 MATTOCK, CRONK'S GAR-

DEN.....\$1.00

MOLE-TRAP, LITTLE GIANT. The best trap on the market. No mole can pass under this trap and live......\$1.00

OIL, LAWN MOWER. This is a handy can filled with fine oil, manufactured expressly oil, manufactured expressly for lawn mowers, bicycles, etc. Per can......20c

POTATO HOOKS, 4-tine, \$1.50

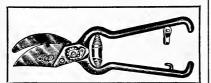
PLANT BED CLOTH. substitute for glass, answering many uses equally well. Light and easily shipped; made of stout, tarred muslin that sheds protects against wea-Write for special prices on large lots.

PLANT STAKES, (wood, painted green) % by % inch, 6 feet long, per dozen, 75c; per 100, \$5.00; 3/4 by % inch, 6 feet long, per dozen, \$1.00; per 100, \$7.50

PLANT STAKES (wire rods for Plants) 9 inches long, per dozen, 20c; per 100......\$1.25 With Pyralin Labels, per dozen, 30c; per 100.... 2.00

PRUNING KNIVES, TREE

Happy Thought. Will cut a limb three-quarters of an inch in diameter. 6 ft. Price.......\$2.00 Waters. 8 ft., \$1.75; 10 ft., \$2.25; 12 ft., \$2.75. Pruning Shears. Lopping shears; 24-inch handles.....\$2.75



PRUNING SHEARS, HAND

California Pattern, 9-inch......\$1.00 California Pattern, Polished, 9-inch.. 1.50 Wiss heavy, extra fine quality, 9-in... 3.50 Wiss, Shear Steel, 9-inch...... 2.50 Ladies' Hand...... 1.50

TWEMLOW'S LIQUID,

PUTTY, BLACK, PEERLESS GLAZ-ING CEMENT. For glazing green-houses. Durable and inexpensive. houses. Apply with machine. Gallon, \$2.00.

PUTTY BULB. A useful tool for applying liquid putty when glazing greenhouses......\$1.35

Happy Thought

RAFFIA, NATURAL. The best tying material for plants, also used for making hats, baskets, etc. Per lb., 60c; 5 lbs., \$2.50.



RAFFIA, COLORED. For making baskets and fancy work in following colors: Black, Blue, Brown, Green, Orange, Pink, Red and Yellow. 1 oz., 20c; 1 lb., \$1.50.

RAKES. See page 88. **SAWS, PRUNING, 16-inch, \$1.25;** 18-inch......\$1.50 SAWS, PRUNING, DISSTON SWIVEL. Swiveled in steel frame to cut in any position.....\$2.50 SASH, HOTBED, UNGLAZED. Made from strictly clear cypress lumber. White lead used on the tenons, and iron dowel pins at the corners.

No. 1. 3 x 6 ft., three rows, 10-inch glass. Each...\$3.50

No. 2. 4 x 6 ft., five rows, 8-inch glass. Each...\$4.50 SCYTHES, ENGLISH LAWN. 30-inch, \$2.75; 32-inch, \$3.00; 34-inch, \$3.25. SCYTHES SNATH, PEERLESS. Each......\$1.50 SCYTHE STONES, TALACRE. English round 40c

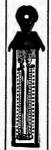


SEED SOWER, CY-CLONE. For sowing wheat, oats, rye, flax, grass seed, clover seed, etc.; in fact any kind of seed, broadcast. They will save their cost almost daily in saving of seed, to say nothing about saving of time and more even distribution, which will have a great effect on the crop. Price..\$2.00

Price.....\$5.00

SHOVELS, STEEL. Square point.....\$1.75 SHOVELS, STEEL. Round point.....\$1.75 SPADE, Boy's D-Handle.....\$1.25
 SPADES.
 Steel polished
 \$1.75

 SPADES.
 Ames steel
 \$2.75
 SPADES, NURSERY. Steel, extra heavy strapped..\$3.75



SPRINKLER, RUB-BER, SCÓLLAY'S. Indispensable for flo-ral work and window gardening. Larg

THISTLE OR DOCK
CUTTERS. Narrow
blade, with handle
for removing thistles
or weeds from lawns,
with foot rest..,\$1.25

HERMOME-TER, Special Grade No. 5150, 8-inch. . 50c



T T T D N A A T T T D C

THERMOMETERS
Medium Grade8-inch, 60c; 10-inch, 75c
Dairy, 10-inch glass
Hotbed or Mushroom\$2.75
Incubator. Prairie State\$1.00
Incubator. Buckeye\$1.00
Brooder. Prairie State\$1.00
TRELLIS. 6 ft. in height, fan shape; made of cypress 1.50
TROWELS. Maynard steel shank, 6 ½ inch
English steel, 6-inch60c
Solid shank, forged steel, 6-inch60c
Solid steel, 6-inch40c
All steel, one piece, 6-inch25c
Ordinary, 6-inch10c
TROWEL, TRANSPLANTING. 6-inch, 25c; 8-inch, 30c
WAX. GRAFTING. 1/2-lb., 25c: 1/2-lb., 40c: 1 lb., 60c

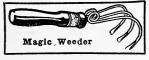
HORTICULTURAL TOOLS AND SUNDRIES-Continued



1838-

WEEDERS Brown's Easy Weeder Cleveland Lawn, with long handle for removing

in working.....25c





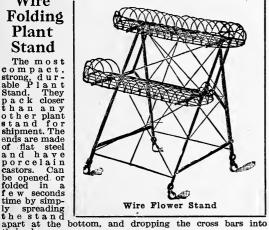
DIAMOND WEEDER The Gardener's Favorite.25c

IDEAL HAND WEEDER

It fits the hand so comfortably that the fingers are entirely free for use where-ever necessary......25c

Wire Folding Plant Stand

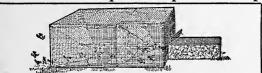
The most compact, strong, dur-able Plant Stand. They pack closer than any other plant stand for stand for shipment. The ends are made of flat steel and have porcelain castors. Can be opened or folded in a few seconds time by simp-



their places. There is more room for the pots and foliage than on any other plant stand that takes the same amount of room on

the floor. -Trays 7½ in. wide x 30 in. long\$6.00
" 7½" " x 30 " " 4.50
" 10 " " x 33 " " 3.00 Tray Stand-

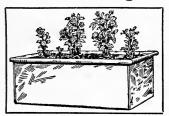
The Dodson Improved Sparrow Trap



"Best Ever" Self-Watering

Flower Boxes

(Galvanized Metal) Specially Designed with Ventilating Subway. Neat and Strong, Green Lustre Weather-Proof Finish.



This box embodies attractive appearance, general utility and durability. The heavy roll edge adds greatly to the appearance, a device inside the box permits of the application of water to the plants without the slightest degree of untidiness which frequently arises from watering the plants by sprinkling, and the good quality japan over galvanized metal warrants long life. Made in lengths as follows: 18, 24, 30, 36 and 48 inches.

All boxes $7\frac{1}{4}$ inches wide at bottom and $6\frac{1}{4}$ inches deep. Width at top over curled flange, $8\frac{3}{4}$ inches.

-18-inch, each \$1.25 30-inch, each \$2.00 48-inch, each 24-inch, each....\$1.50 36-inch, each....\$2.50 Prices :-..\$3.25

STUCCO BIRD HOUSES

THE birds which nest and harbor in cavities and hollows are in most instances the most valuable of our native birds, which love the vicinity of man, seemingly not only to delight him with chirp and song, but are the most diligent to keep plant life free from parasites and devouring insects.

Our model hutlets and cabins which we provide for these charming entertainers are appreciated by all bird lovers.



PRICE LIST OF HUTS AND CABINS

Wren Hutlet, each\$2.75 Bluebird Hut, each\$3.00
Titmouse, each\$2.75 Chickadee Hutlet, each 2.75
Woodpecker and Flicker Hut, each 3.00
Martin Houses\$8.00 to 50.00
Feederies, Small 2.75 to 5.00
Squirrel Cabins, each 8.00
Wren Hutlet, Plain Small, each

BIRCH BARK BIRD HOUSES

Wren Hut\$1.25	Blue Bird	Hut	\$2.25
24 Apartment Mart	in House.		16.00

פשפוות מסום מוחפוום

	ROBITO BIRD HOUSES	
No.	1-Wren	1.00
No.	9-Blue Bird	1.50
No.	6—Chickadee	1.50
No.	7—Woodpecker	2.00

SUET HOLDER

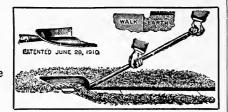
Neat, durable, inexpensive, effective. Next is most attractive to chickadees, nuthatches and downy woodpeckers. Fill the holder, snap the lid down and hang it on a nail or a twig. The birds will do the rest. Each

Postage First and Second Zones, 7c each, extra.

LAWN REQUISITES

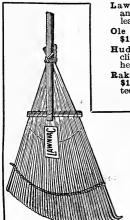
Imperial Lawn Edge Trimmer

Convenient to Handle Moderate in Price



The Imperial Lawn Edge Trimmer trims the rough,

Lawn and Garden Rakes



Lawn Queen. Wire: is reversible and can be used for grass or leaves, 24 teeth............\$1.00

Ole Olsen. Made of best hickory, \$1.00.

Hudson Dandelion Rake. clipping off daisy and dandelion heads.....\$1.25

Rakes, Steel Garden. 12 teeth, \$1.00; 14 teeth, \$1.15; 16 teeth.\$1.25

Japanese Broom Rake

An ingenious device for cleaning the debris out of a lawn or grass plot, leaving it as free from refuse as though swept with a broom. In fact, to get the best results it should be used with the motion of a broom. Made of split bamboo, rigidly secured, with a suitable length handle. Just the borders and from the lawn. Light, durable—efficient—weighs but 12 ounces—yet tough and strong. Contains 44 teeth. Spreads 18 inches. Price......\$1.00 An ingenious device for

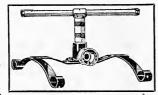
Mitchell All-Wood Lawn Rake

Substantially built of Hardwood but light in weight. Special shaped teeth make it easy to use, getting the loose grass without digging out the grass roots. For raking Leaves it is the finest thing on the market. It will not spear the leaves, so it does away with cleaning off the teeth with the hands. The head will not split. The round Hickory brace keeps the head solid on the handle. With twenty Hickory teeth set in a head 22 inches wide and a 6-foot handle, this rake is the ideal size for general use. \$1.00

Rainbow Lawn Sprinkler

What Rainbow Lawn Sprinklers Will Do. Revolve Rapidly on any Pressure.

Wearing and friction almost eliminated by use of water absorbing fibre washers. Made of Brass. Will not stick or corrode. Heavy Steel Sled. Green enameled stand. Dis-tributes about 5 gallons of water per minute of water per minute evenly over every portion of ground, 20 feet from sprinkler. Will indefinitely, without repair or



attention. do the work it was built for.

No. 5 1/2-Stands 7 inches high. 7-inch revolving head.\$2.00

"Evergreen" Sprinkler For Large Lawns, Parks, Estates, Cemeteries



The Main Stream soars far out, revolving very slowly and covering a broad outer circle.

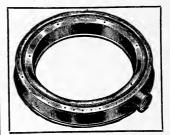
The Small Rotor turns at moderate speed, completing the even distribution to the center; its vibrating impulse, a patented feature, makes possible the perfect control of the main stream at slow speed, the far throw of the main stream and its scattered rain-like distribution.

The Elimination of Gears and Complicated Wearing Parts means Long Life, without constant repair.

The Nozzle has Spray Adjustment. Wind will not stopit. A Labor Saver, the far throw saves frequent setting. Price, \$10.00.

A Labor Save Price, \$10.00.

Lark Sprinkler



Ring Lawn Sprinkler

The simplest lawn sprinkler made. No revolving parts to wear and get out of order or leak. Easily moved about the lawn. Made of pol-ished brass. Light, durable and economical. Each 75c

Market Gardener's Sprinkler

Pennsylvania Lawn Cleaner

This machine will clean your lawn more thoroughly and quicker than three or four men can do it with hand rakes, and greatly benefit the turf-it leaves the grass standing up straight and



LAWN REOUISITES—Continued

The Dayton Rotary and Oscillating Sprinkler

THE most practical, durable, efficient machine ever devised for sprinkling lawns, parks, or irrigating truck gardens. Saves time, labor, hose wear. Dayton Lawn Sprinklers are fitted with 1/2-inch hose connections, as may be desired.



Style A Price.....\$8.00

ROLLER BEARING

ROMBINATION

HANDLE LOCK



Lawn Type Style B. Price. \$3.75

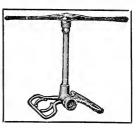


awn Type Style C.



Flaring Rose Sprinkler

Attach to hose in place of nozzle...... Each 75c



Whirling Fairy Lawn Sprinkler

Light, durable, will operate on very low pressure.

Bink's Chicago Sprayer

Is made of aluminum. Adapted for watering garden frames, etc. Each. \$3.00

DUNHAM WATER-WEIGHT LAWN ROLLERS

WITH ROLLER BEARINGS

Dunham Water-Weight Rollers are electric welded—no rivets used—the drum cannot possibly leak.

The Dunham Water-Weight Roller can be made as heavy or as light as desired by simply putting in the right amount of water. For storing away or for moving, it can be emptied entirely and is light and easy to handle.

W. B. Style. Is equipped with a "No-Tip" lock and scraper. The lock holds the handle upright when not in use.

DUNHAM WATER-WEIGHT LAWN ROLLERS WITH PLAIN BEARINGS

No. 2. 1 section, 24 in. long and 14 in. in diameter, weight empty, 68 lbs.; weight, filled with water, 177 lbs.; Price \$10.00 No. 4. 1 section, 24 in. long and 18 in. in diameter, weight empty, 82 lbs.; weight, filled with water, 265 lbs.; Price \$12.50 DUNHAM ROLLERS are painted green on body and ends with red handles and always bear the name DUNHAM,

DUNHAM WATER-WEIGHT PONY ROLLER

THIS Roller is useful for lawns, gardens, etc. Is well made, and with care will last a life-time. Built with two drums each drum 23½ inches in diameter, and 35 inches in width, making a rolling width of 70 inches. Weight of empty roller is 372 pounds; when filled with water 1405 pounds; when filled with sand 2193 pounds. Furnished complete with shafts; also fitted for use with Tractor; each. \$80.00



GARDEN HOSE AND APPLIANCES

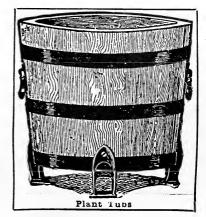
McCullough's Plant Tubs

An excellent tub, neat and durable. Made from 34-inch Cypress,

WILL	iron na	ndies a	nd feet, i	3 S	teel no	ops :	and 2	coa	ats	of a	gre	en '	pai	nt.	
															Each
No.	7 —12 i	inches o	liameter,	11	inches	hig	h								\$2.50
No.	813	"	"	12	44	ű									
No.	9-14	**	"	13	"	"									3.00
No.	10-15	"	46	14	"	66									
No.	11-16	44	"	15	"	66									3.50
	12-17	"	ш	16	"	"									
	1318	46	44	17	46	46									4.25
	14-19	44	**	is	44	24									4.75
0.	10			10				• • •	• • •	• • •	• • •		• • •		2.10

Cypress Plant Tubs

						ed with round bevel	
No foot	hut ou	v, anu i	op et	186 11	hand	d with found bever	
No feet,	Dut 1u	тшѕпеа	with.	Iron	nand	nes.	Each
No. 7-12 i	nches d	iameter	'. 11 i	nche	s higl	h	\$2.00
No. 8-13	"	"	12	"			
No. 9-14	44	"	13	"	"		2.50
No. 10-15	"	"	14	"	"		
No. 11-16	"	"	15	"	ш		3.00
No. 12-17	"	"	16	"	***		3 25
No 13-18	"	**	17	"	"	••••••	> 9.75
No 14-19	44	44	18	"	"		4.25
			10				, 1 .20



"PLANET JR" FARM AND GARDEN TOOLS

PLANET Jr. means, on a farm or garden tool the world over, that it is the latest improved, lightest, strongest, most useful and economical tool of its kind. With Planet Jr. come less work, bigger crops, more money. The Planet Jr. Catalogue is an instructive handbook of short cuts to best results for farmers and gardeners. It illustrates fifty-five latest improved Planet Jr. tools, showing many in use.

Seventy-two helpful pages. Write for it at once.

The Planet Jr. Seed Drills



PLANTS all garden seeds accurately in hills, 4, 12 or 24 inches, or in drills any thickness. cultivates and plows quickly and thoroughly. I lar with farmers and gardeners everywhere. Popu-

Planet Jr. as a Hill and Drill Seeder only. \$13.75



HIS combined machine is intended for gardeners who have a large enough acreage in crops for a Double Wheel Hoe to be used to good advantage, and yet prefer not to buy seeders and wheel hoes separately.



No. 220. Planet Jr. Fertilizer Drill Distributor Price \$26.50 🕒 🕖 Planet Jr.

No. 220 will distribute fertilizer in the middles THE No. 220 will distribute fertilizer in the middles of three rows 12 to 14 inches apart; it will side-dress one side each of two rows up to 36 inches apart (one complete row: and corn in wider rows). You can use it in very narrow rows—as close as 9 inches. You can use it in 42 to 48 inch rows by closing off the flow in three spouts and distributing through the other three—either on the right or left hand side.

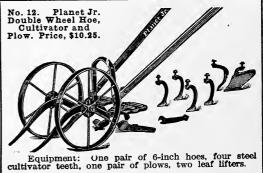
The simplicity, efficiency and long wearing qualities of the No. 220 will appeal to everyone. No chains, gears, or canvas belts to break, rust, tear, or stick.

The Planet Jr. Double Wheel Hoes

ARE the greatest cultivating tools for the onion, and for every grower of garden crops from drilled seed. They do more and do it better and easier than can possibly be done in any other way. Works both sides of plants thoroughly and rapidly at one passage until crops are 20 inches high. Indestructible steel frame and steel leaf lifters.



Has one pair of 6-inch hoes, one pair $4\frac{1}{2}$ -inch hoes, two pairs hollow steel cultivator teeth, one pair plows, two 3-tooth rakes, two 5-tooth rakes and two leaf lifters.



Discs, per pair..... 3-prong cultivator teeth, per pair 1.75 Plows for Double Wheel Hoes, per pair..... 1.40

Handles for Single or Double Wheel Hoe, per pair . . . 1.00

PLANET JR. SINGLE WHEEL HOES AND ATTACHMENTS

WE offer these Single Wheel Hoes as the highest type of their class. They have a great variety of tools which adapt the implements to a large variety of work, and there is scarcely any garden culture of which they are not capable.

1



You can do more and better hoeing with it in one day than you can do in three days with a hand hoe.

The Hoes exchange sides to work to or from the row, and change of wheel regulates the depth.

The Cultivating Teeth are oil tempered and work admirably, are changeable for pitch and are useful for marking out rows.

The Plow is large and capable of heavy work.



It is light, handy and adapted to almost every garden use. The Steel Wheels are particularly well made, with heavy steel spokes; they run easily and are made up true.

The Frame is steel and practically indestructible. The wheel arm and leaf guard are steel also. The handles are adjustable in height.

The Plow is of superior design, complete with land-side; is large and capable of heavy work. It is generally the first attachment to be used in the spring.





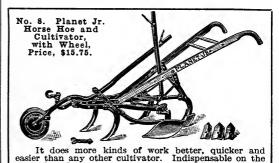
This new number of the "Planet Jr." family will appeal to all those who prefer a high wheel for their garden work. Where the soil has not been so thoroughly and carefully prepared, the high wheel undoubtedly makes an easy running tool. The handles are strong and are provided with "plow handle" grip. They are adjustable for height to suit adult or child.

Planet Jr. No. 2 Edger. With this tool you can edge either straight or curved work, paths, drives, open borders or flower beds, rapidly and beautifully....\$1.60

ATTACHMENTS

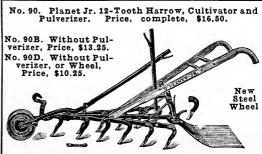
Double Mouldboard Plow for Single Wheel Hoe	\$2.40
Steel Cultivator Teeth and Bolt	.40
Hoes, complete, 4 ½-inch, per pair	1.20
Hoes, complete, 6-inch, per pair	
Plow for Single Wheel Hoe, each	
Rakes, 3-teeth, each 50c; 5-teeth, each	.80
Onion Harvester, 8-inch: each	1.60

THE PLANET JR. ONE-HORSE TOOLS



up-to-date farm.

.....\$14.00 Without wheel.....

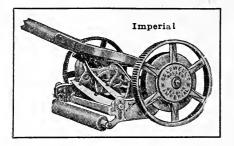


Planet Jr. 12-Tooth Harrow, Cultivator and Pulverizer is invaluable in strawberry. truck patches and the market garden. Its twelve chisel-shaped teeth and pulverizer leave the ground in finest condition without throwing dirt on plants.

No. 4. Planet Jr. Plain Cultivator is equipped with four 3 x 8 in. cultivator steels and one 4 x 8 in. cultivator steel. Has extra high frame, round throated, hollow steel standards with patent beveled steel teeth, and patent expanders, which make an extra stiff tool, yet allow of quick adjustment for width, and one side may be closed while the other is left open.

Price with Wheel. ...\$10.00

LAWN MOWERS, HAND AND POWER



Coldwell's Imperial Roller Bearing High Wheel Mower

THE Imperial Roller Bearing Mower is nicely balanced, enabling the operator to handle it with ease. Furnished with five blades in revolving cutter. Specially designed to meet the demands of park and cemetery superintendents. Durable, light running, easy to push and requiring minimum of attention to adjustments. Roller bearings enclosed in dust proof housings. When packed with light grease will need no further oiling for the season. Best Lawn Mower on the market for hard service in parks, cemeteries, etc.

15-inch......\$17.00 18-inch.....\$19.00 21-inch......\$21.00

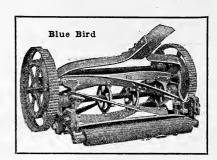
Coldwell's Blue Bird Ball Bearing Mower

In the "Blue Bird" we have a high-grade, light weight machine, which is positively the best five blade 10 inch wheel it. positively the best five blade, 10-inch wheel, ball bearing lawn mower ever built for the price asked. It is provided with flat, sliding pawl ratchet, with direct drive from both sides. The gears are enclosed and protected from flying grass and dirt. The ball bearings are of finest drop-forged steel. case hardened. Height of cut ranges from ½ to 1½ inches, at pleasure of operator. Made in three sizes: 14-inch, \$12.50; 16-inch, \$13.50; 18-inch, \$14.50.

Cadet Lawn Mower

 \mathbf{I}^{S} a good Lawn Mower to sell at a medium low price and give the purchaser full value for his money.

14-inch.... 16-inch.....\$7.50



Suburban Ball Bearing Mower

Suburban Ball Bearing Mower

Is MADE to meet the demand for a good ball bearing machine, which can be purchased at a price within the reach of all. It is made throughout of the best grade material. The driving wheels are 8 inches in diameter. The revolving cutter has four blades, which insures fineness and evenness of cut. It has sliding pawl ratchets, and the adjustment of both bearings and bottom knife is the simplest and most effective ever made. One screw only is required to adjust the bearings, by means of which all looseness in the revolving cutter bearings can be taken up.

14-inch. \$9.25 16-inch. \$10.00

Coldwell's Lawn Trimmer

JACOBSEN POWER MOWERS

4 Acre Heavy Duty Mower

THIS mower has been especially designed to maintain a large degree of power with a minimum expense for upkeep. For this mower a special built motor with a 2 ¾" bore and 2 ¾" stroke has been constructed to maintain a speed of 900 R. P. M. at 3 ½ miles per hour of motor travel. This mower has 24-inch width of cut and on a fuel consumption of about one gallon gasoline per day, will cut 4 to 5 acres per day. With riding sulky attachment will cut 5 to 7 acres per day. We have placed several of this type mower in this territory and all are giving perfect satisfaction. Price. \$285.00 Riding Sulky Attachment, \$40.00, extra. Grass Catcher, \$6.00

The "Jacobsen Junior" has been designed especially for moderately large lawns, or lawns broken up with numerous obstructions. It has a capacity of fully two acres per day, weighs only 150 pounds and is as easy to handle as an ordinary hand mower. The cutting unit is made with five crucible steel blades, well balanced and ac-

made with two crucine steel blades, were satisfied and accurately ground.

This mower is absolutely the smallest, most compact, and simple power lawn mower manufactured. It is guaranteed to operate satisfetorily and to be free from defects. Price, With separate Reel and Traction Clutch....\$205.00 Price, Without Reel Clutch, \$190.00; Grass Catcher.. 4.00

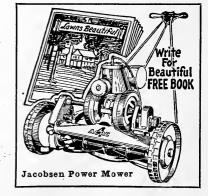
Putting Green Mower

JUNIOR PUTTING GREEN MOWER

..016.

Price, 19-inch Cut, with Grass Catcher.....\$275.00 de a meric

Estate Roller Mower



E MBODIES every refinement and good feature found in any power lawn mower. Being roller driven, the mower is so perfectly balanced that it is exceedingly easy to handle and operate. The cutting unit is adjustable from ½ inch to 2 inches cutting height. Price, 24-inch Cut, complete with Grass Catcher \$310.00

Lack of space prevents us giving detailed description of the Jacobsen Power Mowers, but will mail complete literature to any one interested.

Nox All Grass Catchers

POULTRY APPLIANCES AND SUPPLIES

NEWTOWN GIANT COLONY BROODERS



Newtown Colony Brooder Mothering the Chicks

No.	7.	Cap	acity,	250	chicks	or
le	ss				\$25	.00
No.	11.	Ca	pacity	, 500	chicks	or
le	ess				\$32	.50

No. 12. Capacity, 1200 chicks or

Newtown Little Giant Incubator 600-Egg Capacity......\$145.00

Newtown Oil Burning Colony Brooder

It will care for any number of chicks up to 500, but we do not recommend more than 300 to 350. We believe that is enough to put under any brooder—you will raise more and better chicks in the end.

Each brooder is shipped with everything complete ready to operate. A thermometer and full instructions for operation are furnished with each brooder. Price....\$25.00 Send for descriptive Catalog of the Newtown line.

Buckeye Incubators

We offer these incubators as the best Hot Water Incubators on the market. These Incubators are built in several sizes to meet all requirements both in size and price. Send for Descriptive Catalog.

TOP Descr.	ipuve Cata	HOY.				
No. 14.	(Style E).	Capacity,	65 eg	gs	 	\$16.50
No. 16.	(Style E).	Capacity,	110 eg	gs	 	27.50
No. 17.	(Style E).	Capacity,	210 eg	gs	 	36.75
No. 1.	(Standard)					
No. 2.	(Standard)					
No. 3.	(Standard)). Capacit	y, 250 ·	eggs	 	57.75
No. 4.	(Standard)). Capacity	y. 3 50 (eggs	 	68.00
	Incubator '					
Wire Hole	der for The	ermometer			 	.15

Buckeye Blue Flame Colony **Brooders**

	(Equipped With Giant Brooders)
No. 27A. No. 28A.	Capacity 200 Chicks \$17.50 Capacity 350 Chicks 20.00
No. 29A.	Capacity 500 Chicks

Buckeye "Rite-Heat" Colony **Brooders** No. 101. Capacity 500 Chicks. \$26.50 No. 102. Capacity 1000 Chicks. 31.50

I.	suckeye Electric Brooders	
No. 90.	Capacity 50 Chicks\$14.50	
No. 91.	Capacity 100 Chicks	
No. 92.	Capacity 200 Chicks 24.75	
No. 93.	Capacity 300 Chicks 29.50	

Moe's Dry Mash Hopper

A trial will convince you that it is a Hopper of the greatest merit. Manufactured of heavy galvan-ized iron in four sizes.

No.	35-8 1/2 in. wide, each 9	1.50
	36 —12 in. wide, each	
No.	13-18 in. wide, each	2.40
No.	37—24 in. wide, each	2.80

Improved Handy Hopper





The Improved Handy Hopper is made of galvanized iron throughout. All parts are spot welded together. It is provided with hinged lid over both hopper and trough, making it rat and mouse proof, as well as dirt proof.

It is provided with a swinging front, adjustable to suit any kind of dry mash and which eliminates any possibility clogging.

Hopper is 15 inches in height, 41/2 inches in width and made in four lengths.

No. 1—12 inches in length, each	1.75
No. 2—18 inches in length, each	2.25
No. 3—24 inches in length, each	2.75
No. 4—36 inches in length, each	3.90

Lawn Park Coop



For successful chicken raising it is necessary to protect the young brood from rats, cats and other pests. The Lawn Park is the most successful coop on the market. Size, closed, 18x24 inches; with park extended, 18x48 inches. Height, 24 inches. Price............\$5.00 inches.

Red Chief

Rapid Grinding Feed and Grist Mill For Grinding Small Dry Grain

No. 1.	Capacity, 1 to 2 bushels per hour\$3.60
No. 2.	Capacity, 1 to 11/2 bushels per hour 5.00
No. 5.	Capacity, 1½ to 2 bushels per hour with fly
wheel	
Nos.	1, 2 and 5 Mills clamp or bolt to box as desired.
Have	hooks on which to hang a bucket.
No. 10.	Capacity, 2 to 4 bushels per hour. Fitted with
	neel. Price\$8.50
No. 15.	Combined Hand and Power Mill. Capacity, 6 to
	hels per hour. Price\$14.50
	Power Mill. Capacity, 10 to 20 bushels per
	Price\$20.00

Red Chief Hand Corn Sheller \$1.85

Mann's Green Bone Cutters

No. 5-C. For flocks of 25 to 50 hens. Weight 35 lbs.

 Price
 150 lbs. per hour.
 Weight, 150 lbs. per hour.

 No. 12. Capacity 150 lbs. per hour.
 Weight 260 lbs. price

 Price
 .\$65.00

Send for Descriptive Catalog of Bone Cutters.

Union Lock Poultry Fencing

As all of the cables are the same length, and run the whole length of the fabric, every part can be stretched perfectly. Because of its strength and construction, this fence requires no top or bot tom rail and no more posts than the ordinary woven stock fence, or about one-half the num-ber needed in ordinary poul-try netting. Union Fence is especially adap-ted for use where a light, attractive and neat appearing fence is required.



36-in., bale of 10 rods, \$4.35 48-in., bale of 10 rods, 5.00 60-in., bale of 10 rods, 5.50 12-in., bale of 10 rods, \$2.00 18-in., bale of 10 rods, \$3.00 24-in., bale of 10 rods, \$3.60 72-inch, bale of 10 rods, \$6.00

Royal Thermic Fountain

Made Only in Three Sizes. SANITARY NON-FREEZING

No. 2. 2 gallon, \$3.50 each. No. 3. 3 gallon, \$4.00 each. No. 5. 5 gallon, \$5.00 each. Absolutely Guaranteed.

Oakes Sani-Thermo Fountain

Insures sanitary, healthy water, regardless of season or location. Keeps water warm in winter and cool in summer. No lamps to bother with and no expense! Made of galvanized iron. Top-filled, making it easy to fill and clean. Heav Conical top. Well insulated. Three sizes.

No. E-17. No. E-18. 4.50 each.



Royal Thermic Fountain

Moe's Improved Top Fill Fountains

Provides pure, fresh water at all times. The double wall construction retards freezing and keeps water cool in summer. Fills from the top, easily alcohold and foods extraortic cleaned, and feeds automatic-

	Capacity		
No. 2.	Capacity	2	gallons,

No. 4. Capacity 4 gallons, each.....\$3.25

Moe's Star Fountain and Feeder

Made of a single piece of heavy metal. No solder, no seams, no loose parts. Suitable for feed as well as water. Little chicks can not drown. Fits any Mason jar in 1 Pint, 1 Quart, and 2 Quart sizes. No. 32. (Glass jar not included). 10c





Drop Bottom Fountain

Drop Bottom, easy to fill and to clean. Has wire handle and may be hung on the wall out of the litter and dirt.

2-qt. capacity, 1-gal. capacity, 2-gal. capacity,	each 1.00
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Sanitary Stoneware Fountain

top is removable, The The top is removable, allowing the fount to be thoroughly cleaned inside. The proper thing to use where medicine is given in the drinking water. 1-qt., 40c; 2-qt., 50c; 4-qt., 50c



"Improved" Drop Bottom Fountain

The hinged bottom enables fountain to be thoroughly cleaned, while flat back keeps it firm against the wall. Drinking space two-thirds distance around can.

No. E-23. 1 gal., \$1.25 each.

No. E-24. 2 gals., \$1.65 each.

No. E-25. 4 gallons. \$2.25 each.

Moe's Single Feeding Trough

For chicks and growing stock. Accurately stamped dies. No rough edges, and can be hung on the wall. with dies.

 Sliding top.
 30c

 No. 55.
 Length 12 inches, each
 30c

 No. 56.
 Length 18 inches, each
 40c

 No. 57.
 Length 24 inches, each
 50c

Moe's Double Feeding Trough



trough, with sliding top, easily filled and cleaned.

stamped with dies. No rough edges. | Stamped with thes. | Ro long long | Stamped with the | Ro long long | Stamped | Stam No. 58. No. 59.

Aluminum Feeding Trough

Day Old Baby Chicks

Below are prices of our STRONG VIGOR-OUS PURE-BRED BABY CHICKS from flocks that have been culled closely for egg laying, size, type and color; blood tested for Bacillary White Diarrhea and every possible precaution taken to insure healthy chicks. All chicks hatched in modern sectional mammoth incubators operated in well ven-tilated basement so as to produce those large fluffy chicks that grow and thrive.

We quote the following prices at present:

BARRED, BUFF AND WHITE PLY-MOUTH ROCKS, SINGLE COMB AND ROSE COMB RHODE ISLAND REDS

25 Chicks of any of the above varieties, \$5.00; 50 for \$9.50; 100 for \$18.00.

SINGLE COMB WHITE LEGHORNS 25 for \$5.00; 50 for \$8.50; 100 for \$16.00.

MIXED VARIETIES (All Heavies)

25 for \$5.00; 50 for \$9.00; 100 for \$17.00.

We guarantee 100 per cent live delivery, sent via Express or Parcel Post, charges prepaid. If shipment is desired within two weeks from date, enclose remittance with order for full amount, otherwise enclose 25 per cent of total amount, balance to be sent ten days before shipment. Satisfaction guaranteed.

Prior covieted are subject to change without position.

Prices quoted are subject to change without notice.

Moe's Round Baby Chick Feeder

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 20c

 No. 28.
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 30c

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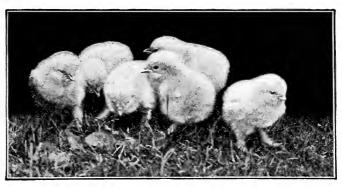
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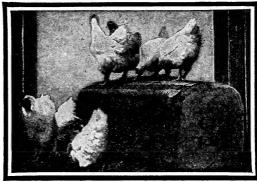
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	h\$0.03			6 inch		\$1.20	\$9.00		05		3.50
235 "		.35	2.50	7 "	18	1.75	14.00		06	.60	4.50
	04		2.75		25	2.75	20.00	7 "	10	1.00	7.00
31/2 "		.45	3.25	10 "	60	6.50		8 "	12	1.20	
4 "		.50	4.00		1.00	11.00		10 "	20	. 2.00	
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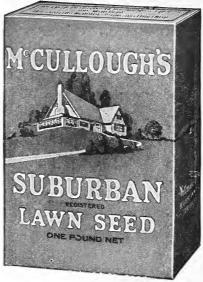
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